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GOOD SITUATION IN THE RUBBER TRADE.

THE outlook for the rubber industry in America appears more favorable now than at any time for many years past. In the first place, it cannot fail to share in the general prosperity now so well assured, and which seems destined to be of long continuance. We have emerged from the period of internal development which followed the civil war, involving the settlement of a territory larger than any country in Europe, with the improvements paid for. The farmers own their own homes; our railway securities are no longer largely held abroad; our manufacturers, after supplying practically all home demands, afford a surplus for export, valued at wholesale at more than $1,000,000 a day. Interests formerly at the mercy of speculators are now firmly based on actual capital and safe management, and a great amount of surplus capital has been accumulated, ready for investment in sound new enterprises, whether at home or abroad. The constant advance in popular intelligence has brought us to the condition of a conservative—though none the less progressive—people, working on settled lines, evolved from the costly school of experience. Moreover, our strength as a world power has been measured, with results that must inspire every citizen with renewed confidence in the future of the country.

The demand for rubber products has kept pace with every advancement made by our people, and is growing faster now than ever before. It is as little likely to decrease permanently as the railways are to give place again to stage coaches. At the same time, the improvement in treating rubber in the factory has enabled goods to be produced of a higher quality and at lower prices than were ever before known. It may be that there are elements in the rubber trade which are not conducive to profits on the whole, but they will disappear in the process of the survival of the fittest, just as has been the case in former years. Meanwhile there are important firms—firms of long standing and well equipped with capital—who are prepared to testify that the past year showed the largest volume of business they have ever known, and the fact that they are still in the field proves that the business was not done at a loss.

There were consumed last year, in the United States and Canada, according to the best estimates obtainable, 42,283,000 pounds of rubber, against 38,101,000 pounds in 1897, and 30,246,000 pounds in 1896. The prices paid were the highest ever known, for while the highest quotation for fine Pará in 1896 was 85 cents, the range of prices last year was between 81 cents and $1.06. It is impossible that this increase in consumption could have occurred, and at such a high level of prices, without a firm demand for products, together with a margin of profits for the manufacturers. Otherwise there would have been a long list of failures, instead of many new factories and enlargements of old ones, accompanied by an increase of capital invested.

No doubt manufacturers have been too hopeful of a decline in the cost of raw material, and too slow to revise their selling prices to correspond with the factory cost of products, but the sound judgment of the leaders in the

trade has prevented them from going too far in the direction of danger, and their path has now been made easier by the general higher tendency in the prices of commodities, which renders the masses, with the return of higher purchasing power, willing to pay more for rubber goods. On the whole, the situation appears so favorable that the rubber manufacturer who fails to do a profitable business in 1899 must be inadequately equipped, with respect either to factory equipment, capital invested, or fitness for the business.

One reason for favorable predictions at this time exists in the steady growth in the foreign trade of the United States at a rate hitherto unknown. It is extending to every line of our production, and must inevitably lead to a larger demand upon our rubber mills, both from other rubber manufacturing countries and from those in which the industry has not yet been introduced.

SOME RESULTS OF HIGH PRICED RUBBER.

WHEN rubber was cheap and plentiful it naturally came to be used in a great many places where it was not an absolute necessity. When, however, the law of supply and demand placed it among the high priced articles of commerce, manufacturers were forced to study economy in its use. In goods where a large amount of elasticity was demanded, nothing came to take its place. But where only flexibility, waterproofing, stickiness, or insulation were called for, many substitutes were found and many ingredients discovered which, used in conjunction with rubber, made it go much farther.

Taking the rubber boot and shoe business of twenty-five years ago, for example, a familiar compound was that known as the "four and six gum," made up of four pounds of fine Pará rubber and six pounds of compound material made up largely of such dryers as plaster and lampblack. The goods were made up in the heaviest manner possible, much of the unvulcanized, and all of the vulcanized scrap was wasted, and such a thing as economy in the use of gum was not known. To-day, however, plaster is entirely eliminated from rubber shoe compounds, and lampblack is used in a much less degree. All unvulcanized scrap is worked over, while every pound of the vulcanized is reclaimed and appears again in the soleing and often in the heavier upper sheets. It has been found, also, that the goods of lighter weight wear equally well and are far more popular. In the line of footwear, the most notable economy in the use of rubber came through the introduction of the wool boot. In doing away with rubber bootlegs and substituting those of wool, there is an annual saving of from 200,000 to 300,000 pounds of rubber—no small item, when present prices are to be considered. When one considers also that the three buckle light weight arctic has practically driven out the light weight rubber boot for gentlemen, ladies, and children, another saving in the crude material is unearthed. It was thought twenty-five years ago that only Parás could be used in the upper sheets, but now Africans are used successfully, and the "blooming" that marked their first introduction has entirely disappeared.

In mechanical rubber goods the economies have been even more marked, and particularly in friction gums. Here it has been possible to use, with signal success, "bastard" gums and specially treated resins, and for covering surfaces, the cheapest grade of Africans, all grades of reclaimed rubber, and an infinite variety of substitutes. In the line of insulation, paper, lead, oil, earth, waxes, and a variety of good insulators have come into use, both with and without rubber. In clothing, both heavy surface and mackintosh, the line of compounding has been nearly identical with that of the mechanical goods trade, and where cheap goods are demanded, a great variety of ingredients, having both waterproofing and sticking qualities, have been called upon to make the rubber go as far as possible. In druggists' sundries, some cheaper gums are used in connection with Pará and white and red reclaimed rubber and white substitutes have in a measure made it possible to manufacture goods at the low prices at which they are now sold.

In addition to all of these economies, as they are practised in the rubber factory, there are outside influences, as in the wool boot business, that incidentally effect quite a saving. The cravenette, for instance, without doubt has cut down appreciably the number of ladies' garments waterproofed with rubber that would otherwise be manufactured each year. In mechanical goods, there are numberless packings in which there is not an ounce of rubber, which supplant rubber packings. In belting also, the cotton belts, treated with the red paint solution, have saved many a pound of rubber for some more necessary use. In the carriage cloth line, the artificial leathers and goods for upholstery purposes, together with the high grade oil productions, exist largely because rubber is so costly that it must be used sparingly.

As substitutes for hard rubber, one has simply to cite celluloid, the various kinds of vulcanized fiber, the shellac and earth compounds that masquerade under a dozen fancy names, and it will be seen that while vulcanite is generally preferable, its high cost has in many instances brought its cheaper rivals into the field.

A further line of economy that is rapidly growing in this country is in the waterproofing of tarpaulins and coarser fabrics for a thousand and one uses, without the aid of rubber. For this purpose compounds of asphaltum, rosin, sulphur, linseed oil, and a variety of earthy matters are used, and exceedingly good results obtained. All of which leads one to wonder if the time is not near at hand when the ingenuity shown in these various forms is not going to crystalize into some rubber assistant that shall be as valuable and generally available, and withal as cheap, as was reclaimed rubber when it was first perfected.

OUR COLONIES AND THE RUBBER TRADE.

IT goes without saying that the rubber industry in America, to say nothing of a thousand other forms of productive industry and profitable business, is very much farther advanced than would have been the case

if England had balked at the problem of colonizing this part of the world and the native Indians had been left in possession. This consideration should not be lost sight of in estimating the possible results from colonizing in general.

According to a recent official publication from Washington, the various colonies, protectorates, and dependencies in the world occupy two-fifths of the total land surface, and their population is one-third of the entire people of the earth. The total imports of these colonies and protectorates average about $1,500,000,000 worth of goods annually, while their exports amount to even more. Forty per cent. of all this enormous trade is transacted with the mother countries, resulting in great benefit to the people living in those countries.

The trading opportunities which the possession of well managed colonies afford would alone be an incentive to the undertaking of control of such islands and other territory as fall in the way of a stronger power, as the Philippines, for instance, have fallen into the hands of the United States But it is feared by some Americans that the control of our new possessions will involve a heavy expense, and embarrass us with difficult problems of administration. The official publication referred to above is instructive in the showing of the extent to which the colonies of the European powers are made to defray, from their own revenues, not only the cost of political administration, but also that of building roads, canals, and railways, making sanitary improvements, and the maintenance of schools. Besides, as a rule, the various colonists are found to be living in peace and content, and to be making advancement at a rate not possible under their native forms of administration. In many cases the colonial police and soldiery are recruited from the native population.

So far as the rubber trade is concerned, there may be no immediate prospect of a large increase in consumption of goods in this line in our new colonies. But the consumption of American goods as a whole can hardly fail to increase as American enterprise makes itself felt in larger and more profitable production of the commodities peculiar to or best adapted to these new possessions, and it seldom fails that, with each increase in the sale of other commodities, the demand for rubber increases. Every branch of export trade which is stimulated by our connections in the Caribbean and the Pacific will lead to increased production here and increased buying power at home, and this, if nothing else, will widen the market for rubber goods.

But this is not the principal consideration. We are at a disadvantage in trying to do business with the other side of the globe at long range. We need trading outposts nearer the consuming markets that are being developed rapidly on other continents—such as England, for instance, has in Hong Kong and Singapore, and have made her predominant in Asiatic trade. The trade of China alone is destined to become enormously valuable, and with such a footing in that direction as we have gained at Manila our chances to share in that trade will be increased to an extent beyond the power of present computation.

THE NEW RUBBER COMBINATION.

THERE appear to have been no important developments in connection with the Rubber Goods Manufacturing Co., since the date of the filing of their articles of incorporation in New Jersey, in January. Parties in interest who have promised to keep THE INDIA RUBBER WORLD informed in regard to the progress made in the organization of the company intimate that they are not yet ready to make any statements for publication. One member of the trade states that the important concern in which he is interested is for sale, but that the price bid by the promoters of the combination does not coincide with that at which the property is held.

Three New York financial houses during the latter part of January advertised in the newspapers that they were prepared to deal in Rubber Goods Manufacturing securities. Under date of February 18 one of them stated to THE INDIA RUBBER WORLD:

"The Rubber Goods Manufacturing Co. has not as yet issued a prospectus. When one is issued we shall be very glad to send you a copy. Subscriptions have sold as high as 117½; they are now quoted at about 110. Subscriptions may be made to the stock, when issued, in any amount, on the basis of 100 shares preferred and 90 shares common, for every subscription of $10,000. At the rate of 110 a subscription of $10,000 would cost $11,000. The preferred stock is quoted in the neighborhood of 82½, and the common about 31."

Quotations published February 25, in the reports of curbstone trading in New York, were: Rubber Goods Manufacturing, 30 bid; 31 asked. Preferred, 80 bid; 81 asked.

The situation as viewed in Boston is thus described in an article which appeared recently in the *Transcript*, of that city:

"The promoters of the scheme having for its object the consolidation of the various mechanical rubber goods manufacturers are not meeting with the success that they had expected. The older and larger concerns, those who have been making money in the business, are refusing to accept the price set upon their plants and good-will by the new company, which are, they say, under the actual value. This is a new condition in trust financiering, as the claim has been that excessive prices have been paid for the concerns that have been acquired.

"In this instance, to quote the representative of one of the local companies which has been counted upon as one of the principal factors in the new trust, prices have been allowed for small, out-of-date plants that are entirely out of proportion to their value to the trust. On the other hand the Boston Belting Co., which has been under one management for forty years and whose stock, based upon a valuation that is conservative in the extreme, shows an actual value of $161 and has been sold at auction of late at $191—notwithstanding this, the promoters of the trust will, it is said, allow but $175, a figure that the company will not consider, especially as it is doing a good business and paying regularly what is considered large dividends, larger in fact than the trust can be expected to pay, or that has been paid by any of the industrial combinations already formed.

"None of the concerns hereabouts, as far as can be learned, have accepted the terms of the trust, which consists merely of the Mechanical, Peerless, Morgan & Wright companies and a few small concerns, but does not in any sense control the trade. The large amount needed to buy up the small concerns does not leave enough for the purchase of the really desirable companies at figures which would be considered satisfactory to their owners. If the deal is carried through at all now it must be at an excessive capitalization, and even then it will be anything but fair sailing for the new combination."

HOOLIHAN ON THE POSSIBILITIES OF TRADE JOURNALISM.

"IS ut th' olive brranch av pace or th'—th'—or arre ye sthill chewin' th' rag?" asked Hoolihan as I dropped in for a moment in passing.

"Neither. Just waiting for developments."

"Begob they'll come, sure—th' ind isn't yit," was the dark answer.

"I take it you have been round in the trade sizing up the situation," said I.

"I hov, an' ut's av exthrame intherist. Ut's sthrange phwat a conflygration a single sparrk 'ull kindle."

"Especially if struck by the flint and steel of a trust," said I, with proper emphasis.

"Saay, that's libellyous. Doan't print thot," warned Hoolihan.

"Never fear—but what do folks say?"

"Oh some saay youse fellers is fools, an' some saay th' new Thrust is fools, an' some saay yur sinsible, an' some saay th' Thrust is sinsible, an' some saay ut's a grreat pity ut ever happined, an' some are dom glad av ut. But I noatice ahl av thim arre rradin' yer paaper."

"And what is your idea?"

"Moine! Begob I hovn't had soa much fun in tin years as phwat comes from rradin' th' paaper. An there's more in soight, glory be!"

"What's likely to happen?" I inquired, curiously.

"Just this: th' new Thrust is starrtin' an oppysishun paaper!"

"Indeed?"

"Oh yis. Th' waay I lerrned av ut was thus. Ye moind thot bye av moine—th' reporther?"

"Yes."

"He comes hoam th' other avenin' an' he sez, sez he, 'Phwat 'ud ye think av me as idditer av a paaper?' he sez. 'Dom little,' sez I; 'idditers is barrn, not made be wroitin up funerals an' proize foights.'"

"'I hov th' shance av me loife ter starrt a paaper in th' rubber thrade an' hov th' advertoisemints av th' new Thrust,' he sez, 'an' lots more too,' sez he; 'only I doan't knoa phwat to naame ut.'

"'Better call ut th' *Wakely Stretcher*,' says I; 'God knoas ut'll be wakely enough an' ut'll laay you out coald,' I sez.

"'Ut's a great opporchunity,' he sez.

"'Indade, is ut? Ye hov a shance fer a foine edthiroal policy doan't ye? Av ye doan't print th' troot yer paaper 'ull be noa good. Av ye do print th' troot th' Thrust, 'ull be noa good.'

"'Thin ye doan't belave in me schame?' he sez.

"'I niver saw anny wan but a lawyer maake annything be pickin' up another man's foight,' I sez. 'Doan't forgit, aither, that av ahl th' traade paapers starrted in the lasht foive years not wan has been succissful. Still, ut depinds to an ixtint on phwat koind av paaper ye starrt,' sez I. 'Traade paapers is av two koinds. Furrst there's th' glad hand stoyle phwat gits ut's advertoisin' be printin' porthraits av laders in th' thraade, saaying swate things av ahl ut's frinds, wid a shlap now and thin at wan phwat doan' pathernize ut. Thot's th' koind yours 'ull be. Thin there's another koind phwat knows how to git soobscroibers, an' tells th' troot widout fear ar favor, an' ut has boath soobscroibers and advertoisers, fer th' raisin thot th' raders is just th' min phwat th' others want to sell goods to.'

"'But suppoase th' firrms doan't loike th' troot tellin', an' taake out ther advertoisements?' sez he.

"'Business is business,' sez I, 'and the madium phwat is th' authority ull be patthernized. Doan't you fergit thot.'

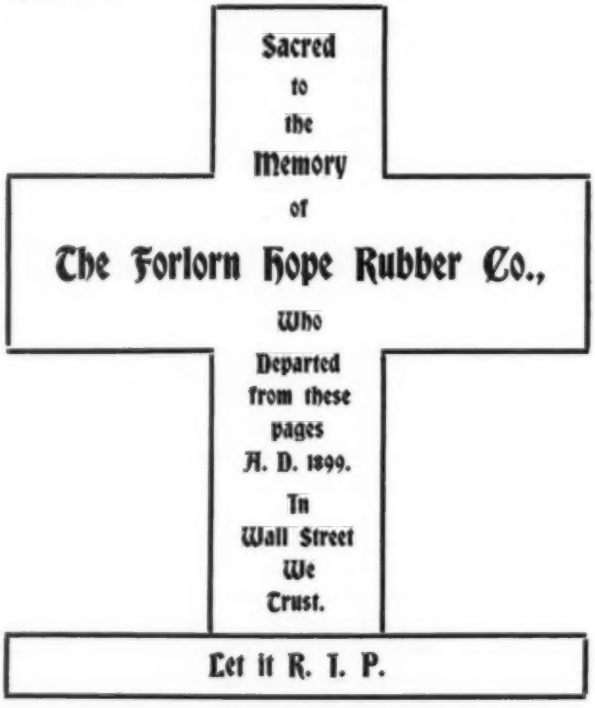
"'Sure th' Thrust can affoord to trow away fifty thousand dollars a year to hov their own paaper, an' publish it wakely at thot', sez th' brat.

"'An' th' other fellers can affoord ter starrt a Wall strate edition of their oan—an' publish it daily av nade be. Doan't touch ut,' sez I. 'Lave that job to some other fool,' sez I."

"Well, was he converted?"

"I doan't raly knoa. But I found an arrticle on the use av rubber mattrasses in jails on his taable this marnin'. But saay, av he does starrt his paaper I think I shall sell me mill to th' Thrust an goa oaver to their soide and take me paage out av yer paaper. Thin phwat'll ye do?"

"Just this," said I: "In deep sorrow at our loss I shall refuse to sell that page and simply erect a picture of a tombstone on it, like this:



"Phwat does R. I. P. mane?" demanded the old man, with a scowl.

"Rest In Peace, of course."

"Amin," said he doubtfully; then, after a thoughtful pause: "Saay how does this pome sthroike ye?

"'Thrice armed is he who hath his quarrel just,
And four times he who gets his blow in fust.'"

THE volume of trade of the two exclusive rubber boot and shoe houses in St. Paul, Minn., during 1898, according to the *Northwestern Shoe and Leather Journal*, reached $710,000, in addition to the extensive trade in rubbers of the four firms wholesaling leather footwear.

PROSPEROUS TIMES IN THE RUBBER TRADE.

"THERE is less talk about the cutting of prices in the mechanical rubber trade," said a prominent handler of crude rubber, whose business naturally brings him into close contact with manufacturers in that line "Of course some talk of this kind always will be heard, but now it is confined mostly to the chronic complainers. From this it must be inferred that an advance in prices has been made within the past few months, and that it is being maintained. There are still some people in the trade who talk in a discouraging way, and insist that they are not making money. Two concerns, in particular, had so much to say on this point that we thought that it might be well not to press them to buy rubber. But when, a little later, we asked them for a financial statement, they were able to make an excellent showing.

"The amount of rubber that the trade is using proves that the business is not in a bad way. The fact is that the mechanical line has been unusually busy. Certain important concerns have assured me that, on account of the growing volume of orders for goods on which they can make a profit, they are dropping certain other lines or grades on which, owing to specially keen competition, they have not been able to make any money. The effect of this course will be beneficial all around. The concerns in whose hands these lines will now be confined will find the demand for their products increased, with the pressure of competition lightened, and they will gradually put up their prices, also, and probably improve the quality of their goods. As for rubber shoes, everybody can see that the weather has been favorable for their sale, and it is easy to believe the manufacturers when they report that their production, which has been on a large scale, has been cleaned out.

"I don't believe in regarding the condition of any one industry—like iron, for instance—as a 'barometer' of trade in general. The rubber trade is influenced largely by the weather. Rubber shoes will sell when we have enough snow, no matter what may be the condition in iron; garden hose will not sell in wet weather, no matter how good the crops may be. No, the rubber trade stands by itself. But I do believe that this country is experiencing a mighty wave of prosperity, and that the rubber industry on the whole has a splendid chance to take advantage of it."

* * *

THE president of a large rubber manufacturing company assures THE INDIA RUBBER WORLD that their business during 1898 was larger than for any previous year. The president of another mechanical goods company said; "We have been making money right along, though of course we don't care to say much about it for publication." The president of a third mechanical goods company said, in answer to questions, that he had been too busy in taking care of profitable orders for goods to give any thought to the plans of the new Trust. The head of a large concern in another line, which is one of the oldest in the trade, said that their business in 1898 had broken all records. A newer company in the same line, which had been understood to be doing a good business, admits to having made profits during 1898 amounting to 47½ per cent. A company in still another line announced lately their first dividend for several years, and that at a good rate.

* * *

R. E. GALLEHER, of the New York Insulated Wire Co., when asked whether any progress had been made lately toward the proposed combination in that line, replied that since all the factories had been so busy little had been heard of the subject. "The insulated wire business is having a boom," said he. "We had expected a dull month or two, as is usual at this season, but instead business has been exceptionally good, and the improvement seems likely to be lasting. There has been increased business throughout our line, though it applies more particularly to the electric lighting branch. The electric light is coming into wider use not only in every part of our own country, but throughout the world. This is due partly to the tendency of capitalists to invest in new enterprises, which is evident on all sides. Money is a drug on the market, and new enterprises must be resorted to if its owners want to get any sort of profit on their capital. One thing which is contributing to new investments is the fact that our excess of exports over imports has become so large. Just think of $50,000,000 a month coming into the country from this source. I think that a great amount of business is certain to be done with our new possessions, involving the investment of much American capital in them. One day not long ago, I saw a row of trucks extending almost across Manhattan island, headed for the pier of a Cuban steamship line and apparently all filled with packages of goods marked 'Cuba.' With more stable political conditions in those islands, and better monetary and financial methods, American capital cannot fail to be more strongly attracted for investment there than in the past. I look for better business during the next five years than we have known for a long time past."

* * *

THOMAS ROBINS, JR., president of the Robins Conveying Belt Co., said: "Through marketing a special line of products, I probably come into contact with some branches of trade not reached by the manufacturers of standard lines of mechanical rubber goods, and everywhere I find evidences of improving business. Rubber has become so important an adjunct to every branch of industry that wherever improvement is shown, as in the mining and metallurgical branches, the rubber men can not fail to profit, if they charge what their goods are worth. There are increasing demands for rubber in every line of industry, and a prospect that the present favorable conditions of business will be permanent. The freedom with which the public has been buying for investment in Wall street is a good sign. We say that we have hard times when the average man is barely making both ends meet. But when so many people are investing money, it means that business has been good, and that they have a surplus."

Mr. Robins thinks that the American export trade in rubber has been hurt by the low grades of goods that have been sent out, particularly to the countries to the south of us. "When no effort is made to sell goods abroad," he said, "naturally our principal exports will be of the lowest priced goods, but whenever foreigners have a chance to compare prices on their goods and our own, quality for quality, they are surprised at the difference in our favor."

* * *

LEONARD Y. CROFT, representing William Wright & Co., rubber importers of fifty years' standing, Liverpool and New York, said: "The conditions of industry and trade in America, in every important branch, seem more favorable to-day than they have ever been before, and there is reason to believe that

they will continue good for years to come, because business is on a safe foundation. This means an improved outlet for the standard products of rubber manufacture, besides which new uses of rubber are constantly affording new opportunities in this industry. Now is the time, if ever, for the manufacturers to make money. When the demand for goods is active is the time to make a stand for prices that will yield a profit. Some of the manufacturers are realizing better prices than they were a short time back, but they don't go far enough. Their estimates of cost are too low, being based on former prices for raw materials, in the hope that rubber will go down again. But this is impossible. The increase in rubber production is slow, and there is a demand for every pound that can be brought to market. Even if there should be a slump in rubber now and then, the manufacturers would get little benefit from it; importers would stop selling and become buyers, in the belief that rubber prices are to remain permanently on a higher plane and that any decline will be only temporary. Manufacturers ought to figure their prices on a basis of $1 for fine Pará. The rubber manufacturers of Europe are making good profits, because they base prices on what rubber costs to-day and not on what it used to cost, and it is a fact that, owing to less keen competition in selling over there, they pay more for rubber than is paid in America. It isn't crude rubber alone that is going up; the same is true of other raw materials. Look at rubber scrap. Buyers thought 4 cents a pound a ruinous price not long ago, but to-day it can hardly be bought at 7½ cents. The rubber men have the opportunity of their lives if they will take advantage of the great demand for rubber goods to revise their prices and base them on the cost of raw materials."

DEATHS IN THE RUBBER TRADE.

PETER F. MARRON, founder of the Marron Manufacturing Co., and president of the Plymouth Rubber Co. (Stoughton, Mass.), died of appendicitis on February 3. Mr. Marron entered the rubber-clothing business at the age of sixteen and was employed by the Hall Rubber Co., the Stoughton Rubber Co., the Metropolitan Rubber Co., and others. He worked in these factories in various capacities, mixing, calendering, running an English spreader, and in the making-up department. In 1893 he started the Marron Manufacturing Co., which he ran for some two years and then merged it into the Plymouth Rubber Co. The first of the two concerns manufactured mackintosh garments. The second, however, was devoted wholly to proofing, and for two years past was so crowded with orders that it ran night and day much of the time. Four months ago the Stoughton plant was destroyed by fire, but within a few days the business was running as usual in a leased factory in Hyde Park, Mass. Meanwhile a new and wholly up-to-date plant was being built in Stoughton in which Mr. Marron took a great interest and of which he was justly proud.

Mr. Marron was a past grand knight of San Salvador council, Knights of Columbus, a member of Stoughton court, M. C. O. F., and of the Commercial and Columbia clubs. Among the many business men with whom he was brought in contact after his advent as a manufacturer Mr. Marron was very highly regarded both for his commercial and social qualities. The business of the Plymouth company will be run as usual, the treasurer, Mr. A. Sydeman, being the actual head.

JOHN H. DEMING.

JOHN H. DEMING, superintendent of the factories of the Peerless Rubber Manufacturing Co. (New York), died on February 13, at his home in Paterson, N. J. Mr. Deming was born at Housatonic, Mass., on May 25, 1844, and after leaving school learned the machinist's trade in the shops of the Worcester and Nassau railway. While still employed there his attention happened to be attracted to the difficulties then experienced in the manufacture of rubber rolls, and the result of some experiments was a new wringer roll which he patented in 1862. In 1866 he became superintendent of the roller room of what is now the Combination Roll and Rubber Co., finally becoming superintendent of their entire mechanical goods branch. This connection lasted until the organization of the Peerless Manufacturing Co., under the laws of New Jersey, in 1872, when he became their general superintendent. Later this concern was reorganized, with a New York charter, gradually extending its scope until it now has a capital stock four times as large as the original amount. Mr. Deming remained with the company until his death, having entire charge of the manufacturing department. He left a widow, but no children.

EDWARD LANDSTREET.

EDWARD LANDSTREET, a member of the rubber trade in Memphis, Tenn., died at his home in that city January 25. He was born in Baltimore, August 26, 1844; served throughout the war in the Confederate army, and was with General Lee at Appomattox; and after the war engaged in the rubber business in Baltimore with his uncle, Mr. Maxwell. Later, in the same city, he formed a partnership with the late John F. Towner, and under the firm name of Towner & Landstreet they conducted a large rubber goods business, at Baltimore and Charles streets. After the death of Mr. Towner the business was continued for awhile by Mr. Landstreet. In 1887 he went to Memphis and entered the employ of the rubber firm of Towner & Co., remaining with them until last April, when he went into business for himself. He was actively interested in the Confederate Veterans and the Confederate Historical Society. He married a daughter of John F. Towner, of Baltimore, who survives him, with three sons—Edward T., Albert, and Herbert.

RUBBER SHOE WEATHER FOR TEN YEARS.

UP to date the snowfall in New York, since the beginning of winter, has been larger than for ten years or more during the same months. H. S. Randall, New York manager for the Boston Rubber Shoe Co., has kept a record of the snowfall in each season, including nothing less than than a half-inch, with the following results, the figures denoting inches:

SEASON.	Nov.	Dec.	Jan.	Feb.	March.	Tota
1889-90.....	¼	5¼	--	1	**20**	26½
1890-91.....	—	**17¾**	—	4½	6	28¼
1891-92.....	—	—	8	—	**22**	30
1892-93	2¼	2	**20½**	**22½**	8	55¼
1893-94...	—	5	**24½**	**34**	—	73½
1894-95.... ...	1½	8	**12**	**14½**	5	41
1895-96.....	—	½	**10**	8½	**30**	49
1896-97.....	6	**20**	2½	**12**	—	40½
1897-98.....	—	4	**15**	—	—	19
1898-99	**20**	6	**12½**	**30**		*68½

[* Excluding March.]

The figures printed in bold-faced type indicate "good weather" for rubbers, and it will be seen that very little of this occurred in some winters. The snow fall in December, 1890, and December, 1894, was encouraging in volume, but in each case it began on the day after Christmas, and rubber men do not value snow so highly at that time as when it falls before the holidays.

THE INDIA-RUBBER INDUSTRY IN EUROPE.

ENGLISH RUBBER MANUFACTURERS COMBINE.

FROM "DIE GUMMI-ZEITUNG" (DRESDEN).

Manchester, December 15, 1898.

AN important meeting of the leading rubber manufacturers of England was held yesterday, in which the formation of an association for the control of the rubber goods business was accomplished. The interest taken in this move was shown by the large attendance at the meeting. The total capital represented by the firms entering the combination amounts to several million pounds sterling. It is not the object of this association, as is customary with combinations of this kind, to consolidate all the firms into one, but to have a board of officers regulate the prices and prescribe rules for governing competition. The principal difficulties which had to be overcome were in regard to the penalties for violations of the rules and the fixing of minimum prices of rubber manufactures. After a long discussion it was unanimously agreed to form a Rubber Manufacturers' Association. The framing of the laws for its government and the election of the board of control was entered into at once. The headquarters will be at Manchester. The principal object of the association will be, as already stated, to prevent unhealthy competition of rival manufacturers and the consequent shrinking of a fair working profit. The combination of these firms is the most important ever attempted in the rubber industry, and may possibly control all the rubber factories in England.

The chief difficulty against which the rubber manufacturers have had to battle is the continually increasing competition of foreign manufacturers, especially those of France, who have entered the markets of the world as capable competitors. Germany, also, has kept the English manufacturer on the alert, chiefly in the manufacture of pneumatic and other tires. In Germany and France the manufacturers of rubber goods, especially of bicycle tires, are not hampered by innumerable patent rights, with which the English manufacturer is burdened. In England patents may be obtained on anything, and the manfacture of hundreds of different kinds of bicycle tires, which any French or German manufacturer would make unmolested, can only be done by the respective patentees. In this respect the American manufacturer also enjoys perfect freedom, and although patented (English) rubber tires from that country or from Germany cannot be brought into England, an enormous quantity finds its way into those English colonies which are not affected by the patent laws. In their home market the Americans meet them in keen competition in tires and other rubber goods not protected by English patents, selling at much lower prices. Under these conditions the task of the new association is extremely difficult. According to reliable reports the manufacture of bicycle tires has been lost to some of the more prominent factories of England, among which are several in the vicinity of Manchester. These concerns have been working for years for the Dunlop Pneumatic Tyre Co., Limited, but, as the Dunlop patents expire in a few years, and that company having been over-capitalized to such an enormous extent that they were unable to use a large portion of their money in their own interest, they have concluded to make their own tires in the future. To this end large factories have been erected at Birmingham, where the manufacture of tires is now in full blast. This circumstance, and its consequent losses to the trade at large, were mainly the causes for the movement.

THE DUNLOP COMPANY'S NEW DEPARTURE.

THE Dunlop Pneumatic Tyre Co., Limited, within a few months, have gone into the manufacture of rubber goods on a large scale, at Birmingham, England. The Dunlop company have always made their own tires, but have purchased the rubber parts—namely, the outer cover strips and the air tubes—from various rubber factories in England. Every Dunlop tire, however, has been made up complete by the company themselves, at their works in Coventry or elsewhere. The company have now acquired the rubber factory of Byrne Brothers at Birmingham, in order to manufacture their rubber parts also. The reasons for this step are understood to be (1) to have the preparation of the covers and tubes under the company's immediate control, and thus escape the risk of inferior quality; (2) in order that the outer covers shall be prepared by a secret process which the company have discovered for the prevention of cracking; and (3) in order that the company may save the intermediary profits which formerly went to the other rubber factories.

But the new régime looks to the manufacture of other rubber goods, as well, and reports have come to hand of important extension of the works. They are referred to as having the finest automatic rubber belting plant in Great Britain. They are also making hose of various kinds, including armored hose; rubber rings and washers, in the manufacture of which automatic cutting machinery is used; waterproof carriage rugs, ladies' mackintoshes, etc.

The manufacture of the Dunlop inner tubes is thus described: "The pure Pará rubber is first laid on a table in strips the size of the tubes. They are then wrapped around laths, and along the side where the two edges of the strips touch, another strip is placed outside and pressed on so as to form a perfect join. All this is previous to vulcanization. The rubber is then placed on a specially designed tool to insure a correct size, and also that circular shape which is now one of the features of the Dunlop tubes, and then they are hung up on long iron racks and run into a large vulcanizer." Rubber strips for the covers of the Dunlop tires are vulcanized in one department by themselves, and seven large vulcanizers are devoted entirely to this work, besides which new plant is being laid down.

The plant referred to above was formerly that of The Byrne Brothers India Rubber Co., Limited, Marion Rubber Mills, Aston, Birmingham. The business and plant were acquired June 1, 1896, by The Rubber Tyre Manufacturing Co., Limited, organized for the purpose by the Dunlop interests, with £150,000 capital. The purchase price was £40,000 in shares and £75,000 cash, and E. J. Byrne was retained as manager for five years. Harvey du Cros is the managing director and Harvey du Cros, Jr., and William du Cros are also directors. The tire manufacturing business alone of the Dunlop companies must be enormous, including the demands not only of the Dunlop Pneumatic Tyre Co., Limited, but of the Coupé and Dunlop Brougham Co., Limited (in which Herbert H. Mulliner, the great Birmingham coach builder, is interested); presumably the Dunlop Pneumatic Tyre Co. (France), Limited, and Clement, Gladiator & Humber (France), Limited, the latter being a combination of leading French bicycle manufacturers who are under contract to use only Dunlop tires. The combined capitalization of the several companies named is £5,760,000 (=$28,800,000).

WESTERN SHOE JOBBERS TALK RUBBERS.

THE Western Association of Shoe Jobbers, at a largely attended meeting in Chicago on January, which was followed by a banquet, elected as officers for this year: President, O. C. Smith, Chicago; first vice president, George W. Freeman, St. Paul, with twenty-six vice presidents, representing eleven states; executive committee, O. C. Smith, Chicago; K. L. Barton, Kansas City; J. Harry Selz, Chicago; I. H. Sawyer, St. Louis; S. B. Foot, St. Paul; G. W. Cady, Cleveland; W. S. Henderson, Chicago; C. H. Kellogg, St. Paul; C. B. Heffelfinger, Minneapolis; Erskine M. Phelps, Chicago. The speakers at the banquet agreed that the work of the association, since its organization in September, had resulted in much good to the trade, in bringing about a better acquaintance among its members and promoting better methods. One speaker said that the association stood for more than the question of prices of rubbers; he wanted the association to be permanent and to include all the shoe trade.

O. C. SMITH.
President Smith-Wallace Shoe Co. (Chicago); president Western Association of Shoe Jobbers.
[From *Shoe and Leather Review.*]

Mr. Daniel P. Morse, of Morse & Rogers, New York, said, in part: "You are talking primarily about rubber prices and about what profit you ought to get on them. We all know there is little enough profit in the rubber business, but don't make a mistake and try to get too much. The United States Rubber Co. has a very considerable problem before it. There are people in the east who are near to the source of supply, who can distribute rubber goods possibly a little cheaper than you in Chicago. You in Chicago can perhaps distribute rubber goods a little cheaper than the firms west of you. There are many problems connected with this. They have to arrange a schedule of prices upon the same goods. They are the same goods whether they are sold by us or by you. Make no mistake in endeavoring to get your prices too high. The tendency of the times is to distribute goods at a small margin of profit, whether in rubber or leather goods. We are interested particularly in these two. Now, if there comes to your mind the thought that you are not making enough on your rubber goods, look about you and view the economy of distribution. If you find people distributing goods at less profit than you, look and see if you cannot acquire a lesson from them and from their methods. If you feel that you are not at the bottom of the cost of distribution, see that you get there. We in the east are commencing to think of an association such as you have here. The eastern states have already such an association and the middle states are thinking of it now. We are thinking of it very seriously, gentlemen, but we do not want to antagonize the consumer. We want to remember him, and we want to have the product of the rubber companies and of the shoe factories brought to him at a minimum cost."

EUROPEAN VIEWS OF THE RUBBER TRUST.

FROM "THE INDIA RUBBER JOURNAL" (LONDON).

THE combination of American rubber manufacturers into one gigantic trust has been causing a considerable stir in the States, and to show what our esteemed contemporary THE INDIA RUBBER WORLD thinks of it, they have published a special "Trust Extra," which number gives full particulars of the attempt made to buy over that paper into giving a favorable report on the proposed "combine." It is not our place to enter into the points of the dispute, but we candidly endorse the action of THE INDIA RUBBER WORLD'S directors in refusing to be "throttled" or dictated to in any way.

The pride of England's commerce has been the freedom of her press, and we are glad to be able to state that, with the exception of a few "gutter magazines," the English press speak plainly, fearlessly, and truthfully. In reviewing the action taken by the American manufacturers in attempting to consolidate the interests of all the rubber manufacturers into one trust, we feel sure that the attempt will meet with disaster, as so many of its predecessors have before it, and those firms will be wise who refrain from giving their allegiance to such an unworkable scheme. Competition is the life of business, and, unless there exists a spirit of rivalry to do something better than one's fellows, the natural result is that one's faculties decline and energy fails. We are quite aware that for every body of men, whatever their occupation, there must be some general laws which should guide them; but as each man is differently constituted and has different requirements, so must that constitution and his particular requirements be differently provided for, and if the wherewithal is not forthcoming from one source, another must be found, and, however many join together to one corner or inflate any one thing, there will still be those left out, or who will come into being in opposition who will, sooner or later, cause the downfall of the combination.

FROM "DIE GUMMI-ZEITUNG" (DRESDEN).

[Conclusion of an article on the "Kautschuktrust in Amerika," in the issue of February 3, 1899.]

ABOVE all, the Trust and its promoters appear unfavorably before the public since they have endeavored to coerce the press. By the proffer of advertising patronage—and as that did not succeed—by almost incredible intrigues, the attempt was made to induce THE INDIA RUBBER WORLD, the most reputable American journal of the trade, to abandon its antagonistic position, and to publish matter favorable to the trust. To the determined character and high sense of honor of the publishers of THE INDIA RUBBER WORLD it is due that these schemes failed to their purpose, and were made public.

The trade will therefore know the truth, and the whole truth, concerning the Trust and its methods, which is all that any one could desire. This affair is a most convincing example of the fact that no industry can afford to be indifferent to the character of the individuals to whom the control of its trade press and means of publicity is intrusted. Independence and directness of purpose are the only conditions under which a trade journal can render an industry true and really valuable service, particularly in a time of crisis such as this.

We can therefore only express our hearty approval of the conduct of our American contemporary, and shall keep our readers informed of the progress of affairs concerning the Trust.

A REVISED scale of discounts on leading brands of rubber stamp pads went into effect February 15. The reason given is "the increased cost of materials, especially tin boxes."

THE AUTOMOBILE OUTLOOK.

WHILE there are continued indications of the ultimate great development of the automobile interest, it is not possible for machines of this class to come into such immediate wide use as some carelessly written newspaper articles would indicate. One of the most important companies in the field write as follows, regarding their own plans:

TO THE EDITOR OF THE INDIA RUBBER WORLD: In reply to your favor we would say that it is impossible to make any accurate forecast as to the number of motor vehicles which will be put into service, but from the results now being obtained from our company in New York it would not be an extravagant estimate to say that probably 200 more vehicles, similar to those now in use, will be constructed during this year, and, if the subcompanies (which are expected to be organized) are properly pushed, this number may be very greatly increased.

It is perfectly safe to assume that the motor vehicle industry has come to stay and that, while its development will be slow at first, it will increase with gigantic strides, and evidently to the great advantage of the rubber business.

MORRIS & SALOME.

Philadelphia, January 24, 1899.

It has since been reported that the Electric Vehicle Co., of New York, a subsidiary concern, are arranging to place orders for the construction of 200 more cabs. There are to be 25 of the ordinary coupé pattern, 75 hansom cabs, 50 full-extension broughams, seating four persons each, and 50 three-quarter extension broughams, accommodating three persons each, the last two being new styles of vehicles. All are to be delivered by June 1. A new building in Forty-second street, near Third avenue, is to be used as a construction and repair shop, and a changing station is to be built downtown and another on the east side, the company to operate 100 vehicles from each station.

BUTTON HOLES IN MACKINTOSHES.

ONE of the most perplexing problems that confronted the manufacturer in the earlier days of mackintosh making was button holing the garment. The large number of button holes required made a large force of hands necessary and, besides, it was essential that the work should be strong, with good wearing qualities, and also that it should be of handsome appearance. The nature of the material rendered it very difficult to produce button holes possessing these qualities and impossible to do so at all, except at extravagant cost.

The use of the Singer Manufacturing Co.'s button hole machine (No. 61-4, in its present improved form) has happily solved this problem. Its use in mackintosh factories is now practically universal. It produces button holes of uniform excellence in durability and in appearance so rapidly as to reduce the cost to a minimum figure.

The machine is fitted with an automatic cutter (which alone effects a saving of from 25 to 30 per cent.), automatic stop, foot presser, and in fact with every approved device for adding to the convenience of the operator, enhancing production, and improving the quality of the work.

The positive simplicity and durability of the mechanism and the fact that it can be successfully used by any intelligent sewing machine operator has made this machine very popular with manufacturers. A sister machine (Singer No. 16-69), specially arranged for sewing buttons to mackintoshes, extensively used in some of the best factories, together with other productions of the same company, will be noticed in future issues of THE INDIA RUBBER WORLD.

MORE RUBBER PLANTERS FOR MEXICO.

THE Hon. William D. Owen, whose term of office as secretary of state for Indiana has just expired, left Indianapolis on February 21 to visit a rubber plantation in Mexico in which he has been interested several years. He was accompanied by Mr. Daily, the state auditor, and Judge Wiley, chief justice of the appellate court. Mr. Owen writes to THE INDIA RUBBER WORLD with great confidence of the future of rubber culture in Mexico, to which he intends to devote his personal attention, having secured 5000 acres near Ubero, on the National Tehuantepec railway. Mr. Owen is not connected with the Santa Maria Coffee and Rubber Co., incorporated at Indianapolis on December 29, with $200,000 capital, who have not yet acquired any lands.

THE INDIA RUBBER WORLD has had a visit lately from Mr. Edward Trippe, an American who for some years past has resided at San Juan Evangelista, Vera Cruz, Mexico. He has established a coffee plantation and is now planting rubber, in the hope of finding this equally profitable. He has as neighbors there Messrs. C. R. L. Findlay, J. C. Harvey, and other Americans whose interest in rubber has been mentioned hitherto in THE INDIA RUBBER WORLD.

THE ANTWERP RUBBER MARKET.

TO THE EDITOR OF THE INDIA RUBBER WORLD: Since our last sales our market has had an improving tendency, and several parcels have been sold at good prices. Our sale to-day went off very satisfactorily, showing a rise from 25 to 40 centimes for white rubber, other kinds selling at a rise of 12½ centimes per kilogram. The United States bought on a good scale. Following are the prices obtained:

Lots.	Kilos.	Description.	Valuation.	Paid.
No. 96.	28,512	Lower Congo, red thimbles..	f. 5.70	f. 5.82¼
No. 97.	10,000	Equateur ball.....	9.50	10.20
	23,000	Equateur ball.....	9.50	10.10
	10,104	Equateur ball.	9.50	10 00
No. 98.	2,000	Uellé.....	9.40	9.82½
	6,492	Uellé	9 40	9.65
No. 99.	3,763	Lake Leopold II.....	8.25	8.80
No. 100.	52,659	Lopori ball.....	9.75	10.22½
No. 101.	5,500	Wamba thimbles, red.....	4.00	4.70
No. 102.	463	Wamba thimbles, black.....	7 60	7.72½
No. 103.	1,272	Loanda I, red.....	9 52½	9.70
No. 104.	356	Loanda I, black.....	9.40	9.60
No. 105.	823	Angola thimbles, black... .	8 50	8.62½

The steamer *Albertville* arrived to-day from the Congo, carrying about 205 tons of rubber, consigned as follows:

Bunge & Co	107,600 kilos,	Sundries.
Société Anversoise....	17,500 "	Mongalla.
Société ABIR.....	14,000 "	Lopori.
Produits Vegetaux Kassai	13,500 "	Kassai, red.
Société Coloniale.....	48,000 "	Sundries.
Société Belgika	2,500 "	Sundries.
Compt. Com. Congolaise.....	2,800 "	Wamba.

SOCIÉTÉ COLONIALE ANVERSOISE.

Antwerp, February 10, 1899.

ANTWERP RUBBER STATISTICS.

[*Supplied by* EMILE GRISAR.]

DETAILS.	1899.	1898.	1897.	1896.	1895.
Stocks, December 31, 1898..	263,340	94,463	139,628	88,854	39,432
Arrivals, January, 1899.....	285.833	87,337	125,311	43,621	35,399
Total.....	549,173	181,800	264,939	132,475	74,831
Sales in January	250,662	90,096	144.486	60,877	22,696
Stock January 31	298,511	91,704	120,453	71,598	52,135

THE INDIA-RUBBER MOVEMENT OF 1898.

EXPORTS FROM PARA AND MANAOS.

THE table which follows, supplied by the courtesy of Reimers & Meyer, gives the amount of rubber exported by the various firms at Manáos and Parà during 1898, the figures expressing pounds:

EXPORTERS.	To United States.	To Europe.	Total Exported.	Stock December 31.	Grand Total.
Pusinelli, Prüsse & Co.*	7,093,201	6,028,578	13,121,779	480,603	13,602,382
Adelbert H. Alden	5,784,727	2,344,927	8,129,654	242,506	8,372,160
La Rocque, Da Costa & Co.	2,914,137	3,279,884	6,194,021	198,414	6,392,435
Rud. Zietz	418,138	4,110,950	4,529,088	99,207	4,628,295
The Seara Para Rubber Co.	2,810,042	124,890	2,934,932	264,552	3,199,484
Witt & Co.	720,375	1,674,898	2,395,273	165,345	2,560,618
Marius & Levy	14,145	1,440,726	1,454,871	99,207	1,554,078
J. H. Andresen, Successors	—	837,574	837,574	143,299	980,873
Denis Crouan & Co.	105,801	619,316	785,117	110,230	895,347
Velhote Silva & Co	—	814,663	814,673	46,297	860,960
R. Suarez & Co.	—	662,334	662,334	110,230	772,564
H. A. Astlett	683,966	37,835	721,801	—	721,801
B. A. Antunes & Co.	196,906	289,912	486,818	—	486,818
Luiz Schill & Sobrinho	—	430,611	430,611	—	430,611
Kahn & Polack	—	394,956	394,956	11,023	405,979
Kanthack & Co.	44,648	330,899	375,547	22,046	397,593
Brocklehurst & Co.	346,226	6,614	352,840	26,455	379,295
Singlehurst, Brocklehurst & Co.	—	227,363	227,363	26,455	253,818
Lajeunesse & Co.	9,378	208,998	218,376	—	218,376
A. Berneaud & Co.	136,972	27,520	164,492	—	164,492
Pires Teixeira & Co	137,915	3,690	141,605	—	141,605
Sundry small shippers	194,624	657,408	852,032	425,488	1,277,520
Direct from Iquitos	—	2,074,844	2,074,844	—	2,074,844
Stock in first hands	—	—	—	473,989	473,989
Total	21,671,801	26,628,790	48,300,591	2,945,346	51,245,937

[* Representing Reimers & Meyer, New York and Boston; Heilbut, Symons & Co., London and Liverpool; Boston Rubber Shoe Co., Boston.]

The movement from Pará fell below that of 1897, though with this exception it was the largest on record. It is assumed that, but for the known detention of considerable rubber up the Amazon, on account of low water, toward the end of the year, the Pará output would have exceeded that of any previous season. It is to be noted that the share of the exports going direct to Europe was much larger than that of the United States. The exports direct from Iquitos have increased at the following rate:

	Pounds.
During the year 1896	556,404
During the year 1897	1,025,679
During the year 1898	2,074,844

RECAPITULATION OF EXPORTS.

YEAR.	To United States.	To Europe.	Total Exported.	Stock Dec. 31.
1898	21,671,801	26,628,790	48,200.591	2,945,346
1897	25,612,369	24,057,665	49,670,034	2,078,372
1896	19,941,596	27,681,888	47,623,484	2 341,284
1895	24.804,854	20,983.759	45,788,623	1,514,920
1894	23,062,386	19,869,306	42,931,692	1,865,091
1893	25,011,027	17,163,404	42,174,431	3,758,843

THE UNITED STATES.

FROM the treasury department at Washington, D. C., come the revised official figures of the India-rubber movement for the calendar year 1898, which are presented below in comparison with the statistics for three years preceding, the figures expressing pounds:

Imports:	1895.	1896.	1897.	1898.
India-rubber	41,760,774	34,059.909	42,159,126	44,256,026
Gutta-percha	3,031,155	2,321.452	1,002,897	367,269
Total	44,797,929	36,381,361	43,162,023	44,623,295
India-rubber goods	$309,513	$277,580	$313,585	335,061
Gutta-percha goods	75,962	82,128	142,526	125,772
Total	$385,475	$359,708	$456,111	$460,833
Exports:				
Boots and shoes	$ 244,592	$ 168,131	$ 237,125	$ 224,734
All other	1,432,027	1,701,273	1,517,358	1,440,492
Total domestic	$1,676,619	$1,869,404	$1,754,483	1,665,226
Foreign manuf'tures	$ 7,574	$ 13,418	$ 31,885	$81,110
Crude India-rubber	2,217,697	1,687,546	3,077.076	2,919,274
Gutta-percha	47,859	.....	8,032	65,970
Total, pounds	2,265.556	1,687,546	1,458,634	2,983,244

With respect to the countries whence the crude India-rubber was imported, the government statements supply these figures, the figures also relating to pounds. Much of the Pará rubber received will be seen to have come by way of Europe:

FROM—	1896.	1897.	1898.
United Kingdom	5,696,039	7,962,039	10,853 611
Germany	1,061,015	1,289,577	1,719.521
Other Europe	2,319,278	4,166.474	5,504.449
Mexico	114,010	113,976	192,122
Central America	1,127,580	1,014,630	1,205,490
West Indies [Venezuelan]	39.103	17,795	35.327
Brazil	21,933,727	25,744.128	22,287,508
Other South America	1,283,927	1.357,964	1,723,189
Africa	3,228	10,960	7,162
East Indies	471,378	468,276	673,184
Other Countries	10,624	13,307	57,463
Total Rubber	34,059,909	42,159,126	44,256,026
Gutta-percha	2,321,452	1,002,897	367,269
Grand total	36,381,361	43,162,023	44,623,295

ROTTERDAM RUBBER STATISTICS.

WEISE & CO., of Rotterdam, have favored THE INDIA RUBBER WORLD with statements regarding the movement of India-rubber, Gutta-percha, and Balata at that port, from which the figures below have been compiled:

INDIA-RUBBER ARRIVALS.

	Kilograms.		Kilograms.
Thimbles, red	157,000	Gambia	35,700
Thimbles, black	7,150	Mozambique	16,000
Thimbles, niggers	6,200	Java and Sumatra	22,400
Congo ball	33 000	Borneo	31,500
Benguella niggers	52,000	All other	6,600
Kassai red	36,500		
Upper Congo	143,500	Total, 1898	656,400
Sierra Leone	109,000	Total, 1897	705,650

Stocks, January 1, 1899 ... 36,100 kilograms.
Stocks, January 1, 1898 ... 60,000 kilograms.

BALATA ARRIVALS.

	Kilograms.
Surinam sheet	76,800
Venezuela block	158,800
Total, 1898	238,600
Total, 1897	226,350
Stocks, January 1, 1899	
Stocks, January 1, 1898	60,000 kilograms.

GUTTA-PERCHA.

	Tons.
Stocks, beginning of year	130
Arrivals	260
Aggregating	395
Sales during 1898	215
Stocks, end of the year	180
Stocks end of 1897	130

LIVERPOOL AND LONDON.

WILLIAM WRIGHT & CO. (Liverpool) report the following rate of increase in the imports at Liverpool of Ceará, Pernambuco, and Mangabeira sorts (in tons of 2240 pounds):

YEARS.	Ceará and Pern'buco.	Manga-beira.	YEARS.	Ceará and Pern'buco.	Manga-beira.
In 1889	170	8	In 1894	216	60
In 1890	100	55	In 1895	275	61
In 1891	300	60	In 1896	438	61
In 1892	270	50	In 1897	450	80
In 1893	250	70	In 1898	756	140

The stocks of rubber at Liverpool and London on December 31, 1898, are classified by Messrs. Wright & Co., as follows:

LIVERPOOL.	Tons.	LONDON.	Tons.
Pará, first hands	585	Central American	160
Pará, second hands	310	East India (Borneo, Penang, Assam)	351
Peruvian	4	Madagascar	42
Ceará and Pernambuco	110	Mozambique	71
Manicoba	12		
African	470		
Total	1491	Total	624
Total, 1897	1066	Total 1897	298
Total, 1896	1072	Total 1896	344

The total estimated imports of all descriptions into Liverpool during 1898 were 17,523 tons, and into London, 2801 tons—a total of 20,324 tons, against 16,680 tons in 1897 and 18,295 tons in 1896. The imports of Africans were larger than in any former year.

ANOTHER COMPANY PLANTING RUBBER.

THE Oaxaca Coffee Culture Co. were incorporated at St. Louis, Mo., a little over a year ago, with $125,000 capital for the purpose of growing coffee in Mexico. A desirable location was secured on the isthmus of Tehuantepec, directly on the line of the Tehuantepec National railroad, and about equally distant from the gulf of Mexico and the Pacific ocean. After operations had been commenced many rubber trees were found on the estate, with every condition necessary to their highest development. Accordingly arrangements were at once made to plant 100,000 rubber trees.

Regarding the returns which may be expected from the cultivation of the rubber tree, the *Bulletin* of the Bureau of American Republics for January, 1898, says: "Formerly dependence for a rubber yield was placed in the product of the wild trees, but with the increase in the uses for India-rubber and the consequent rise in price, capital is being invested in this industry, and its profitable cultivation is being largely engaged in. . . By the sixth year the grove will be in bearing and the seventh year and thereafter should yield from three to five pounds of rubber per tree. Giving 600 pounds as the yield of 193 trees and 50 cents per pound as the profit realized over the expenses, we have a profit of $300 gold, per acre." An interesting fact with regard to the Oaxaca company is the fact that their plantation is being developed on what might be called a coöperative plan, the stockholders in the company paying only $2 per month on each share of stock. By this method the company is in receipt of a regular monthly income for the development of its plantation, without accumulating any large amount of idle capital. They have an advertisement on another page.

RUBBER "GALOSHES" FOR TURKEY.

THE Providence Rubber Shoe Co. were reported lately to have filled a good order for women's overshoes, for export to Constantinople. They are described as looking something like a misses' spring over, very wide, with pointed toe, almost straight, there being little difference between the right and the left. Turkish women have very short but broad feet. The rubbers made for them are about one-third heaver than the ordinary sandal, much of the extra weight being at the heel, which is of the self-acting pattern.

In a statement prepared by the Philadelphia Commercial Musuem on the shoe trade in Turkey, the following appears in regard to rubber shoes, or "galoshes":

"The galosh, used by everyone, is indispensable in this country. This is an overshoe, and in a city like Constantinople, where the mud is permanent for five months, it is of great service. There are two kinds of galoshes, leather and rubber. The rubber galosh, or overshoe, on account of its lower price, is much more used than the leather. It has the advantage of fitting all of the shoes of the same person, whereas the leather galosh fits only the shoe for which it is made. The ladies, with very few exceptions, wear rubber galoshes only. The leather galoshes make the foot look much larger. It is the same way with the children.

"The consumption of rubber galoshes at Constantinople is enormous. Once they used to be imported entirely from England; now Russia, the United States, and Germany supply the larger portion of them. The rich Mussulmans wear galoshes all the year round so as to save themselves the trouble of taking off their shoes several times a day on entering the mosques.

"As for prices of rubber galoshes, the best and dearest are those from America; they are sold at 4.70 francs per pair. Those made in England, not as good as the American, cost 4.45 francs. The Russian galoshes cost 4.25 francs; the German, of a very inferior quality, are sold at lower prices. In quantity, England has the first place. Russia comes next, followed by America and Germany, the importation from which is very much reduced. The annual consumption in Constantinople must attain 400,000 pairs. Women's rubbers are sold at 2.50 and 3.85 francs; girls' rubbers at 2.10 and 3.35, and the children's galoshes at 1.25 and 2.10 francs."

The United States consul general at Constantinople wrote, in a recent report: "The importation of rubber shoes into this district can be increased very materially, and I am told that some of the principal dealers are disposed this year to import a large number of United States rubber shoes." There is nothing in this statement inconsistent with the fact that very small exports of rubber footwear from this country to Turkey are indicated in the customs returns. As is well known, many articles of merchandise exported from the United States go first to England, for instance, and are reshipped thence to the consuming countries, often not being credited to this country.

DECISION IN A TIRE FABRIC SUIT.

A DECISION rendered lately in the United States circuit court of appeals at Cincinnati in the case of the Palmer Pneumatic Tire Co. *v.* Henry A. Lozier will be final, since it appears that an appeal is not to be carried to the United States supreme court. The question involved was the priority of invention of a tire fabric, for which patent No. 493,220 was granted to John F. Palmer March 7, 1893, and patent No. 539,224 to R. W. Huss May 14, 1895. Huss's application was made in the latter part of 1893, the delay in granting his patent being due to Palmer's patent having been declared in interference. After a long contest the examiner of interference awarded priority of invention to Huss, and a patent was issued accordingly. The matter was at once carried to the courts by Palmer, but the first decision was in favor of Huss, whose interest had been acquired by Henry A. Lozier. An appeal was taken to the court at Cincinnati, where the case was practically thrown out, the decision being to the effect that the *fabric* patents of both parties are invalid, because, in previously making applications for patents on *tires*, both parties illustrated and described the fabric without at that time making special claims for the fabric. The decision referred to relates in no way to the patents for tire construction held by Palmer and Huss. A patent attorney is quoted by *The Wheel* to the effect that the thread fabric over which the fight was made is now open property, and it is within the province of any tire manufacturer to produce thread fabric tires provided he does not infringe on the patents owned by Palmer and Lozier, covering the methods of winding and constructing the tire. This, he stated, is practically impossible, since these two concerns cover every known method of accomplishing the desired results.

A letter to THE INDIA RUBBER WORLD from another manufacturer than those named above, expresses much satisfaction at the result of the decision, in the belief that it has opened to his concern the way to an important extension of its tire trade.

THE TIRE INDUSTRY IN ITALY.

THERE are two important tire firms in Italy, says *The Cycle Age*. One firm, besides manufacturing their own tires, manufacture for the trade, with any trade work desired by their customers. "There, is, therefore, keen competition between tires of the same quality made by the same firm, but sold under different names, each of them being advertised as the best. This firm, being the only house engaged in rubber manufacture in this country, has a certain advantage." The same writer thinks that American single tube tires would find a market in Italy, if pushed properly, and adds: "Any tire company starting business in this country should import their tires complete and avoid the big mistake of manufacturing, duty being less on complete tires than on parts thereof. Complete tires pay 50 lire per 100 kilos [=$4.39 per 100 pounds], while manufactured rubber pays 50 per cent. ad valorem. Besides this, there is solution, benzine, thread, etc." It is mentioned that tires for the rough Italian roads should be very strong, and the tread thick. The difficulty of getting American tires repaired has hindered their introduction.

A SIGN OF PROGRESS.—We beg to assure the few croakers in the electrical field that genuine progress has been made during the past year. A striking evidence of this fact is shown in a communication received by a large wire manufacturer, in which a request was made for prices on "rubber-covered, steel clotheslines."—*Electrical Review* (*New York*).

CLASSIFICATION OF RUBBER EXPORTS.

TO THE EDITOR OF THE INDIA RUBBER WORLD: Referring to your recent request for an enlargement of the classification of exports of domestic manufactures of India-rubber, I enclose to you a copy of a letter just received from the collector of customs at New York, indicating the difficulty of showing accurately the kinds of rubber named in your proposed classification, owing to the fact that exporters designate so much of their India-rubber goods simply as "manufactures of India-rubber."

The government has no means of compelling exporters to give minute details in regard to articles exported. Therefore, if some should give the items in the terms which you indicate, and others simply designate their goods as manufactures of India-rubber, the incomplete details would be misleading. Very respectfully,

O. P. AUSTIN,
Chief of Bureau of Statistics, Treasury Department.

Washington, D. C., January 4, 1899.

[COPY.]

Office of the Collector of Customs, Port of New York,
December 31, 1898.

Chief, Bureau of Statistics,
Washington, D. C.

SIR: In reply to your letter of the 16th instant, "W," enclosing a copy of a letter received by you from the Editor of THE INDIA RUBBER WORLD (New York), in which is suggested a detailed classification in the exports of India-rubber manufactures, I would state that the classification proposed would be practicable if the shippers of these articles would furnish the detailed description in their manifests, but it would be impossible for the statistical clerks of this office to distribute among the proposed classes merchandise cleared as "rubber goods," the usual description given. Owing to this fact, I could not approve an extension in the classification of India-rubber manufactures at the present time. Respectfully yours,

G. R. BIDWELL,
Collector.

OUR first exports of rubber goods to an important extent consisted of boots and shoes. Gradually, as other goods began to be exported, they were classified together as "All other rubber goods." Now, these amount in value to several times that of rubber shoes, and an inquiry made in the direction of a more specific classification results in the correspondence printed above.

AMERICAN QUALITY THEIR STANDARD.

THE important new rubber works of the Dunlop company at Birmingham are described at length in the *Whitehall Review*, by a writer who incidentally indulges in a statement which every American mechanical rubber manufacturer would do well to note:

"We were shown in this factory," he writes, "the finest automatic rubber belting plant at present in this country [Great Britain]. Rubber belting has long been favorably known in America, where it is almost universally used, but in this country, probably because it has not been well made, its reputation does not stand so high. In the Dunlop rubber factory, the rubber belting is made exactly on the same principle and by the same machinery as in America, and therefore they are able to get like excellent results."

THE Tyrian calendar for 1899 is as neat a bit of printing, as well as modest and effective advertising, as one need look for. It is just the thing for the office desk.

THE COMPONENT MATERIALS OF ELASTIC BRAIDS.

The Rubber Value Decided to be Less Than That of the Fiber.

UNDER a recent decision by the United States general appraisers at New York, elastic braids made of vegetable fiber and India-rubber are dutiable at 60 per cent. *ad valorem* under paragraph 339, act of July 24, 1897, irrespective of the value of the India-rubber component, and not at 30 per cent., under paragraph 449. Braids of silk and India-rubber are likewise dutiable at 60 per cent., under paragraph 390, and not at 50 per cent., under paragraph 391.

The articles which were the subject of protest consisted of—

1. Braids about ⅛ to ¼ inch wide, made of fine lisle thread cotton and India-rubber, described in the invoices variously as "black hat elastic," "black national elastic," and "black cotton braid."

2. Oval braids, about ⅛ inch wide, made of silk and India-rubber and invoiced as "white satin oval braid," and "black satin oval braid."

Joseph W. Green, treasurer and general manager of the Glendale Elastic Fabrics Co. (Easthampton, Mass.), testified on behalf of the government to the effect that the India-rubber thread used in making elastic braids, such as those in question, was a distinct article of commerce, having quotable value according to size and quality, and was bought by manufacturers of braids in warps or strands of great length, ready for insertion in tubes set under the braiding machines. These rubber threads form merely the framework or foundation about which the cotton or silk threads are worked into the braid, which would be a perfect braid without these rubber threads, which are introduced simply to make the braid elastic. Nine-tenths of the actual labor cost in fabricating the braid to its complete condition is applied to the cotton or silk threads, as these threads have to be spooled, wound upon quills or bobbins, and then, in the process of braiding, almost the entire time and attention of the man operating the machine is given to working these threads, the renewal of the bobbins, etc. The rubber threads, being stationary in the tubes, require little attention. Mr. Green said that he was familiar with the imported braids which were the subject of protest, and they were similar to those manufactured in his own establishment. Indeed, all the elastic braids made abroad differed little from his own product, and he was familiar with the cost of producing braids both in England and in this country.

In Mr. Green's judgment the cost or value of cotton component in those of cotton and rubber would vary from 55 per cent. to 60 per cent., as against 40 per cent. to 45 per cent for the rubber component in the finished braids, and in those of silk and India-rubber the proportions would be about the same. His estimate of the rubber cost or value was on the basis of $1.50 per pound for No. 1 Pará, the quality used at his works, but a lower grade of rubber might possibly have been used in the imported braids, there being four qualities of Pará rubber threads, which varied in price from 50 cents to $1.50 per pound. He also said that the cotton in these braids was a fine quantity, about No. 90, of dull finish lisle thread, the price of which in this market was about 70 cents per pound, duty paid; that the price of India-rubber thread here and abroad was practically the same, but that cotton thread was higher here than in England, was gradually decreasing, and that he found it to his advantage to buy here rather than to import it. He said that the element of labor cost of cotton and India-rubber braids at Easthampton was about 25 per cent. of the cost of the completed article, as against from about 20 to 22 per cent. in England, and in those of silk and India-rubber about the same, the high cost of the latter, considering the greater value of the completed article as made by them, being due to the fact that they required a higher order of skilled labor.

Richard R. Taylor, sole director of Archibald Turner & Co., Limited (Leicester, England), manufacturers of the imported goods in question, appeared before the board on behalf of the protestants. He testified that India-rubber was the component material of chief value in all the articles exhibited; that the different elements of cost entering into their fabrication were apportioned as follows: In those made of cotton and India-rubber, India-rubber 44 per cent., cotton 34 to 36 per cent., and labor 20 to 22 per cent., and in those made of silk and India-rubber, India-rubber 49 per cent., silk 43 per cent., and labor 8 per cent.; that the value of the rubber was taken in the form of thread ready for use on the braiding machine, and of the cotton and silk in the form of dyed thread on spools or bobbins, also ready for use on the machine. He explained that the low percentage of labor cost in the silk braids, as compared with those of cotton, was due to the much higher value of the former, whereas the machine would make nearly as much silk braid in a given time as it would of cotton, the price of labor being the same in each case, which, he said, was paid for by the piece, according to the number of strands in the article. He said he was unable to apportion the actual cost or amount of labor in the fabrication of the braids in their completed condition *separately* to the cotton and India-rubber and silk and India-rubber, as in arriving at the cost of the braids he simply calculated the price paid for the India-rubber and silk and cotton threads, in the condition stated, and actual amount paid the man for braiding.

"An analysis of the testimony of these two witnesses," says the decision, "shows a more comprehensive knowledge of the details of manufacture and appreciation of the true elements which constitute the component material of chief value by Mr. Green than by Mr. Taylor, it being apparent that the cost of labor in the process of braiding is almost wholly devoted to the cotton or silk thread, as clearly stated by Mr. Green and ignored or disregarded by Mr. Taylor."

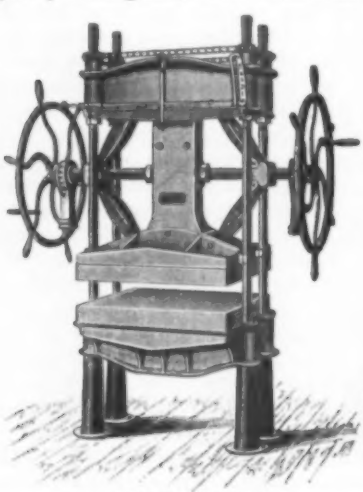
THE LATEST SUBSTITUTE FOR RUBBER.

A RECENT English flotation is Maponite, Limited, the avowed object is to acquire, at a cost of £75,000, and work a patent applied for (No. 2887 of 1898) by F. E. Macmahon, for a new compound which he calls "maponite." The new company is capitalized at £100,000, of which some £45,000 in shares were lately reported to have been issued. It is claimed that "maponite" can be used in the manufacture of golf balls, cricket balls, tobacco pouches, spring blocks for railway car buffers, belting, and other articles now made of Gutta-percha and India-rubber. It is claimed by the inventor that this substance is vulcanizable at 260° F. So far, no publication emanating from the company—the prospectus not excepted—gives any details of any practical results from the use of "maponite," but this is not unusual in "floating" companies.

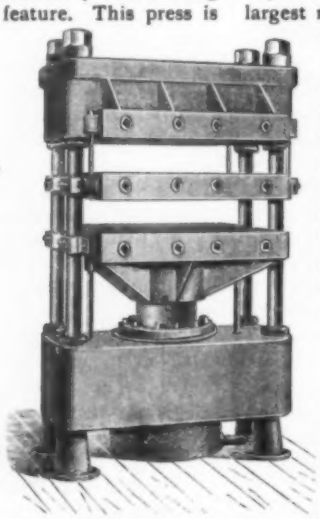
RUBBER FACTORY EQUIPMENT.

PRESSES FOR RUBBER WORK.

THE first of the two presses illustrated on this page is designed for vulcanizing India-rubber and for applying heat to other articles in process of manufacture. The base and platen are of hollow construction, to allow for the admission of steam and one or more intermediate steam plates can be hung to the platen by means of bolts. The top and bottom plates have asbestos packing interposed between them and the platen and base, which acts as a non-conductor and saves steam. The distribution of steam is perfect, leaving no "dead" places. The surfaces are planed smooth and true, and tested with steam before leaving the factory. The stands on which the press rests may be made of any desired height. They are furnished with a pressure indicator, which enables the operator to determine the exact amount of pressure being put upon the goods, and is a valuable feature. This press is



STEAM PLATE PRESS.



HYDRAULIC STEAM PRESS.

made usually in sizes from 24″×30″ to 48″×96″, though other sizes may be obtained to order.

The hydraulic steam presses made by the same manufacturers are useful for sheet rubber and large mold works. They are referred to as being very convenient for use, and capable of being operated quickly when used in connection with an accumulator. The plates are separate and packed with asbestos between head and plates. The ram and cylinder are so constructed that the packing can be renewed without dismantling the press. Stops are provided for regulating the drop of the platen and the distance between plates can be adjusted readily. The rams can be covered with brass if desired. Hydraulic presses are made with plates from 16″×16″ to 4′ 0″×12′ 0″, and any number of plates desired. The requirements of the trade differ widely with regard to pressure, and the amount of pressure required largely controls the price.

These machines are examples of the extensive line of hydraulic, knuckle joint, and power screw presses manufactured by the Boomer & Boschert Press Co. (Syracuse, N. Y.) who have supplied equipment in their line to most of the India-rubber manufacturers in the country. The catalogue of this concern gives descriptions and illustrations of all these machines, and cannot fail to be of interest to rubber manufacturers.

THERMOMETERS VS. GAGES.

IT being a fact that the best results in rubber vulcanizing are obtained at certain fixed and even temperatures, the accuracy of the thermometer employed to regulate such fixed temperatures is of paramount importance. Many rubber manufacturers have been averse to the use of thermometers, owing to their fragility and liability to disarrangement while in use, preferring to rely upon the uncertain qualities of steam gages rather than to be annoyed with the above-named characteristics of some thermometers. The improvements which have been made in thermometers for this purpose by so encasing the tubes as to render them practically indestructible, making the mercury column non-separating by means of gas pressure in the caliber of the tube above the mercury column, obviate the old objections to the use of thermometers, and in some of the largest rubber factories the latter have displaced steam gages entirely.

The Hohmann & Maurer Manufacturing Co. (Rochester, N. Y., and No. 85 Chambers street, New York) have accomplished the above in their high-grade separable thermometers, and have replaced the old style thermometers and steam gages employed in many rubber plants with this improved instrument. The proposition which they have to offer to such factories as are still using the old style thermometers or steam gages, is a liberal one and manufacturers who have not been benefited by this change of equipment would do well to communicate with them.

A DIRECT GERMAN-AMERICAN CABLE.

THE establishment of a company to lay a direct cable between Germany and the United States now seems assured. It is asserted that certain agreements have been made with American cable companies, by which the cable itself must be manufactured in England and laid by way of the Azore Islands. The American companies in question have pledged themselves to use the new line for the transmission of their despatches to and from Germany. The German postoffice has guaranteed the transmission of a certain number of words, and the profitable working of the line is therefore said to be fully insured. The share capital—20,000,000 marks—has been furnished by a number of banks and private capitalists. The syndicate organized at Cologne for the construction of the line includes Felten & Guilleaume, of Mulheim, and the Land and Sea Cable Co., of Cologne. The latter company, whose share capital amounts to 6,000,000 marks, has already purchased land on the North Sea coast for the construction of a cable station, and has ordered the construction of several cable-laying steamers. The Berlin *Deutsche Zeitung* concludes an article on the subject as follows: "Thus the first step is taken to free Germany from the British cable monopoly which, in the event of war, might become fatal to us."

A WRITER in our London contemporary notes the appearance of several advertisements for men having a practical knowledge of the rubber shoe industry as carried on in Russia, from which he infers that the number of factories in this branch is to be increased.

RECENT TRADE PUBLICATIONS.

FINE RUBBER GOODS FOR THE DRUGGISTS', SURGICAL, AND STATIONERS' Trade. Davol Rubber Co., Providence, R. I. [Paper. 9" × 6". 98 pp.]

THIS is the largest, most complete, and most attractive catalogue of goods in these lines yet published. It is referred to by its authors as "equal, and in many respects superior, to a line of samples from which to select." The most striking feature of the catalogue is a series of forty-seven full page half tone plates, representing the whole line of products of the company with an exactness impossible except by means of photography, which has been employed here with more than usual success. Facing each of the plates is a page of appropriate descriptive matter, including the price of every article referred to. Such a book cannot fail to make a favorable impression in maintaining the reputation of this long established and successful firm.

SUPERIOR GRADE OF MECHANICAL RUBBER GOODS—COTTON Hose, Bicycle Tires, Carriage Cloths, Etc. The Joseph Stokes Rubber Co., Trenton, N. J. [Paper. 4⅜" × 7⅜". 120 pp.]

A FULL description of the products of a company, whose new plant was noticed at length in THE INDIA RUBBER WORLD for December 10, 1898. Much information of value to users of the various lines of mechanical goods is given here in concise form, with the aid of numerous and well executed illustrations. The list of specialties included is particularly full, but for details in regard to tires reference is made to a special catalogue.

BICYCLE TIRES AND TIRE SUNDRIES. MECHANICAL FABRIC CO., Providence, R. I. [Paper. 4" × 6". 16 pp.]

THIS company claims the honor of being the original manufacturers of pneumatic tires in the United States. The catalogue describes the well known "Conqueror," "Flexifort," and "Wainwright" single tube and the "Flexifort" double tube tires, together with a liberal assortment of inner tubes, valves, and repair plugs.

[CATALOGUE OF THE] CLEVELAND RUBBER WORKS OF THE Mechanical Rubber Co., Cleveland, Ohio. [Paper. 5¼" × 8¼". 119 pp.]

This newest catalogue in the trade is also the most comprehensive one that has appeared for a good while. The tone of its reading matter is accurately set forth in a prefatory note setting forth that: "There has been no effort to unduly extol the goods described. We believe that a catalogue should describe goods. When this is carefully done, the catalogue has fulfilled its mission." In addition to full lines of belting, packing, and hose, the Cleveland works turn out a long list of specialties, to which several pages of this catalogue are devoted, with the result of showing that the scope of the rubber manufacturer is constantly widening. These goods range from rubber-covered rolls for tin plate mills to poker chips; from carsprings to fruit jar rings; and require about 150 references in the index to the catalogue.

The impression once existed that the rubber trade afforded no opportunity for artistic or even tasteful catalogue making, but the attractive appearance of this book shows the impression to have been a mistaken one. We have received also a copy bound handsomely in leather.

TIRES. THE B. F. GOODRICH CO., AKRON, OHIO. [PAPER. 4" × 6". 15 pp.]

RUBBER BICYCLE SUNDRIES, GOODRICH GOLF BALLS, ETC. THE B. F. Goodrich Co., Akron, Ohio. [Paper. 4" × 6". 20 pp.]

A RECENT issue of a leading bicycle journal estimates that about half the bicycle tires produced in the United States are made within the walls of a single factory in Akron. This catalogue comes from that factory. Their tire list now includes the "Goodrich" regular, tandem, triplet, and quad; "Goodrich 999" road, tandem, triplet, and quad; "Palmer;" "G. & J." (made under license); "M. & W." (made under license); Bailey's "Won't Slip" tires; "Buckeye," and juvenile. The list of sundries, in a separate pamphlet, is particularly full.

SPECIAL CATALOGUE OF RUBBER AND COTTON GARDEN HOSE, Reels, Nozzles, Couplings, Sprinklers, Etc. The Manhattan Rubber Manufacturing Co., New York. [Paper. 3⅛" × 6". 14 pp.]

A TIMELY and handsome catalogue, prepared by the company's secretary, Mr. E. M. Henderson, covering a wide range of goods, and containing an effective view of the company's factories. It has an artistic cover design.

PENCILINGS. JOSEPH DIXON CRUCIBLE CO., JERSEY CITY, N. J. [Paper. 5" × 6¾". 16 pp.]

A HANDSOME illustrated descriptive catalogue of a leading brand of lead pencils, manufactured by a firm who have their own rubber plant for the manufacture of pencil tips and other erasers.

INDIANA AND WABASH SINGLE-TUBE TIRES, 1899. THE INDIANA Rubber and Insulated Wire Co., Jonesboro, Ind. [Paper. 6¾" × 3". 12 pp.]

THIS catalogue is issued by The Thorsen Co., Chicago, who are sole selling agents for the tires described, and includes a number of testimonials from rubber merchants and others who have handled the tires satisfactorily.

LAWN SPRINKLERS AND HOSE SPECIALTIES. CATALOGUE NO. 10 1899. Pleuger & Henger Manufacturing Co., St. Louis. [Paper. 6" × 9½" 19 pp.]

COVERS a full line of goods, fully illustrated, with prices. Includes also plumbers', waterworks, and hardware specialties.

SOME NEW CALENDARS.

LAFAVORITE Rubber Manufacturing Co. (Paterson, N. J.) have brought out an "Engineers' Calendar" for 1899 which has a leaf for each month, on each of which is a portrait of a naval or military hero of our late war with Spain. It is a souvenir worth having, and one will be sent to any engineer requesting it.

=The S. S. White Dental Manufacturing Co. (Philadelphia) have issued for 1899, in their usual neat style, their memorandum calendar, embracing a leaf for every week in the year. Dentists will find it particularly convenient for recording appointments.

=One of the neatest advertising souvenirs that the Boston Belting Co. have ever gotten out is their "petite calendar" for 1899. It is a morocco covered book, so small that it easily fits in the pocket-book. It contains four unstickable leaves for stamps and a complete calendar for the year, and very modestly calls attention to the goods of the Boston Belting Co.

=The first publication that the Voorhees Rubber Co. have put out to the trade is an "Army and Navy" calendar. It consists of twelve cards printed in colors, the cover being gold embossed, with an eagle, an American flag, and a likeness of William McKinley, commander-in-chief of the American army. Following this are pictures of Dewey, Miles, Sampson, and other heroes of the American army and navy, together with battle scenes on land and sea. The calendar is one of the neatest and most appropriate that has yet reached us.

="After the Golf Game" is the title of a beautiful picture in colors, representing an animated scene on the lawn in front of a grand old country mansion, where a half-score of golfers have assembled after a hard-fought game. Below the picture hangs a calendar and above it is the inscription "Davidson Golf Balls, the only perfect ball of American manufacture." It is hardly necessary to say that this is sent out by the Davidson Rubber Co. (Boston, Mass.).

SOME NEW RUBBER GOODS.

A RUBBER STOPPER THAT LOCKS.

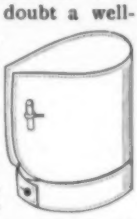
A NOVELTY that will appeal to travelling men, but not to hotel help, is manufactured by the United States Glass Co. (Pittsburgh, Pa.) It is a pure gum rubber stopper, over which fits a metal cap, in the top of which is a lock. When fitted to a whiskey jug it locks automatically, so that no amount of twisting will remove it and only the holder of the key is able to get at the content.

THE BI-TENSION EXERCISER.

THIS is made of pure Pará rubber without pulleys or covering, and hence it neither jars or binds; its action being almost identical with that of the muscles and all the movements are smooth and natural. It may be adjusted to a hook in the woodwork to a doorknob, or to a hinge or anything that will stand the pull. Flexible loops are provided in the place of handles, so that the thumbs, fingers, or flat palms may be used in the exercise. All natural and helpful muscular exercises can be taken on the Bi-tension exerciser. The Spink Chart of Approved Calisthenics is presented with it, and is a perfect instructor in exercise with or without apparatus. The exerciser weighs but ½ pound and coils up to a size 1×3×5 inches. It will be repaired free any time within five years. Manufactured by The Spink Co., Cleveland, Ohio.

NECKWEAR IN WHITE RUBBER.

THE progress that has been made of late in the manufacture of what are called white rubber collars and cuffs is simply marvelous. The "M. & M." goods, for instance, are said to be made of a white rubber composition, that will not chip on the edges, but wears perfectly smooth. They can hardly be distinguished by the eye from the best laundered linen, and do not wilt in hot weather, nor do they turn yellow as does celluloid. Well dressed people have no doubt a well-founded prejudice against celluloid neckwear. There is no reason, however, why the best dressed person in the world should not wear so cleanly, healthful, and becoming an article as is produced to-day in white rubber. The illustrations show a collar and cuff manufactured by the M. & M. Manufacturing Co., Springfield, Mass. In a later issue something will appear concerning colored goods and other specialties of white and colored rubber, made by the same house.



RUBBER IN WAR-SHIPS.

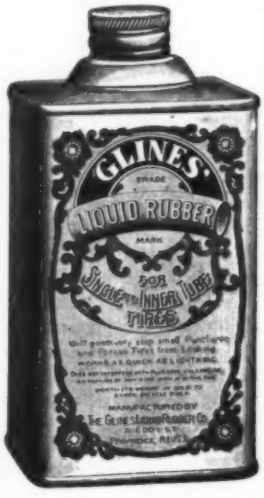
THE French naval experts are turning away from cellulose as a filling between the plates of a war-ship and are experimenting with India-rubber. Tests have already been made on a structure fitted with cellular double sides, filled with rubber and perforated by shot many times below the water line. It was found, after a considerable time, that only a few pints of water had leaked into the interior.

INDOOR GOLF.

A PARLOR game that may or may not appeal to golf players, but will certainly interest those who are kept much in doors, is known as McArthur's Indoor-Golf. The set consists of five large bright red disks, numbered 1 to 5, four clubs, and four soft rubber balls. The disks or "holes" should be placed in the different rooms, that the players may make a circuit without interfering. The game is played according to the regular golf rules. The balls used are soft and cannot mar the woodwork, while, from the shape of the club, it is impossible to loft the balls into the pictures or through the windows. Manufactured by Eugene Arnstein, No. 86 West Lake street, Chicago.

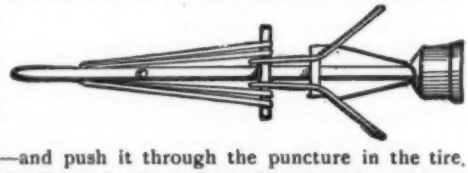
GLINES LIQUID RUBBER.

A SOLUTION for repairing pneumatic tires of all kinds, or for stopping small punctures or leaking through porosity, is called liquid rubber. It is claimed that it not only does not injure the rubber in any way, but, on the contrary, makes the tire last longer and ride better. It is further claimed that it does not interfere with vulcanizing or plugging or any other repairs in the hands of repair men. A special point in its favor is the claim that it does not require any washing out, as do so many so-called puncture fluids. It is put up in cans, each holding enough of the liquid for two tires. Manufactured by the Glines Liquid Rubber Co., No. 21 Eddy street, Providence, R. I.



RUBBER BAND TIRE MENDING TOOL.

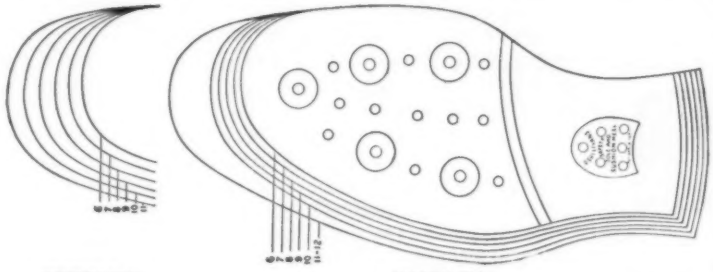
THIS device is put up in a neat box of vest pocket size, which contains, in addition to the tool, one tube of rubber cement and the rubber bands with which repairs are effected. The latter are placed on the tool as shown in the illustration. The method of repair is described as follows: Wet the tool—to prevent the rubber from slipping out—and push it through the puncture in the tire. Pinch the little clips and pull out the tool (a minute's work) and the rubber band slips off, and the tire is mended. Special attention is called to the fact that this tool does not enlarge



the puncture, and that, placing the rubber band in the position shown in the cut, the result is that when the tool is withdrawn the rubber band is completely tied up in a bunch with the largest part on the inside of the tube, thus completely filling the puncture and making it airtight. The tube is screwed onto the head of the tool, and by squeezing the tube, the cement is forced through the holes, as shown in the illustration, right around the rubber band, so that the band is cemented strongly in place when the tool is withdrawn. Made by the James H. Burt Manufacturing Co., Springfield, Mass.

THE O'SULLIVAN SAFETY SOLE.

THERE has been described already in this department [June 10, 1897] the safety cushion rubber heels for boots and shoes, manufactured by O'Sullivan Brothers (Lowell, Mass.) A patent has been granted on this heel in the United States and Canada, and it is reported that it is meeting with a good sale—over 87,000 pairs for December, 1898. The same firm now announce "O'Sullivan's Safety Sole," the novel feature in which is a ⅛ inch lift of pure rubber, extending from toe to ball, the surface



FRENCH TOE. CADET TOE.

having safety suction recesses to prevent slipping. Instead of stopping at the ball of the foot, it continues to the heel, reduced in thickness at the instep to $\frac{1}{32}$ inch, thus obviating any chance for water to work up under the sole. In the center of the five large suction recesses are projections, which, in the process of locomotion, are in constant action, preventing the lodgment of dirt or snow in the cavities. The suction principle is the same as that employed in the cushion heels. Sizes are made in the current styles, two shapes being illustrated in the accompanying cuts.

THE BRENDEL SPRING TIRE.

THIS tire is referred to as doing away with the use of air in the "so-called pneumatic tire" on bicycles and vehicles of any and all descriptions, and substituting a helical spring tire, which may be punctured without interfering or inconveniencing the rider on the road, thus obviating the necessity for carrying pumps and repair kits. Rubber encased spring tires have been used hitherto, but it is claimed that the spring, when subjected to pressure during use, "was compressed radially and at the same time expanded laterally with the tire, and its several convolutions worked and shifted on the inner surface of the tube, and in a short time cut through the same." The Brendel tire contains a spring wire, wound to form a circular helix which extends throughout the length of the tire. The several turns or convolutions of the helix do not each consist of a plain circle, but are formed in a special manner, so that the pressure exerted radially on the helix is taken up in such a way that the convolutions or turns do not expand laterally under such pressure. Manufactured by the Brendel Spring Tire Co., No. 509 West Twenty-eight street, New York.

THE "HOLDFAST" BICYCLE GRIP.

THE object of this invention is to provide a broad bearing for the "heel of the hand," thus enabling riders to avoid the cramp consequent upon a long continued fixed position. The cut shown herewith is on too small a scale to indicate the shape of the grip, which is so modelled as to fit the inside of the closed hand. The inventor advises THE INDIA RUBBER WORLD that though his idea at first was to make a grip for the amateur, they are now used by the bicycle police, and by several racing men of prominence. The material being non-absorbent, the grip remains clean. These grips are made of "Fibrone," supplied by the Newark Saddlery Co., who also furnish it in large quantities for electrical fittings, as a substitute for hard rubber. The "Holdfast" grip is sold by the inventor, Francis W. Kitchel, Perth Amboy, N. J.

DOUBLE TEXTURE CAR CURTAINS.

THE car curtain to day is a very much better article than it was even a year ago. The best type is made of double texture cloth, mackintoshed and run through a doubling machine. It is just as much a rubber curtain as a mackintosh coat is a rubber coat, and while this may not be appreciated by the trade at large, the biggest curtain manufacturer in the United States recently considered the idea seriously of putting in his own spreaders in order to do his own proofing.

THE TURKO-RUSSIAN FOLDING BATH CABINET.

THE manufacturers of this cabinet come out with the very frank statement that it is made purposely better and higher priced than many bath cabinets now on the market. The use of these cabinets has become so general that it is well to know the houses that make a point of turning out high grade goods. The cabinet is very simple in construction and can be used by any one. It is, in brief, a rubber covered folding box in which the patient sits to take either Turkish, Russian, dry steam, oxygen, medicated, or perfumed baths. Manufactured by Mayor, Lane & Co., No. 144 White street, New York.

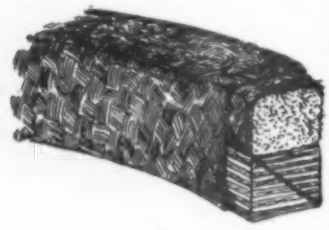
WAXED END SEWED PACKING.

BY a new process of manufacture all possibility of splitting is successfully overcome by stitching with wax ends, through the plies in each coil, near the wearing edge and parallel with it. The result is that if the rubber friction gives out, or if the wearing edge disintegrates rapidly, the plies are still held firmly

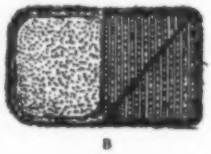
together and the packing is in no wise injured. This has been found to be true even after the friction had been destroyed by oil or ammonia. As a matter of fact, anything that has heretofore acted to destroy the wearing of this kind of packing is found to have little effect on it when sewed with wax ends. Manufactured by the Goodsell Packing Co., No. 33 South Canal street, Chicago.

A NEW PACKING FOR HARD SERVICE.

MICA packing is a new article designed for use where the requirements with regard to packing are particularly severe. In addition to good materials as the basis of this packing, its manufacture involves the use, for lubrication, of mica and Dixon's graphite. The character of the packing is shown in cuts *A* and *B*. It consists first of square duck rubber, cut diagonally to allow one half to slip past the other when pressure is applied. On top of this square duck thus cut is placed about an equal quantity in size of flax, thoroughly lubricated. Around this combination is woven a cover which holds the lubricated flax and the divided duck packing in place. The packing is then thoroughly lubricated with graphite and mica. Cuts *C* and *D* will show how the packing is used in the stuffing box. Cut *C* represents the packing when first applied, and shows how it is placed in the stuffing box. The packing is sufficiently soft to yield, and fits snugly in the box against the piston rod. The faces of the duck packing where cut diagonally are covered with graphite, so the halves slip easily past each other under pressure when the glands of the stuffing box are tightened. As the packing wears and the glands continue to tighten, the packing takes the shape shown in cut *D*. Mica packing is carried in stock in all sizes from ¼ inch to 1 inch, but larger sizes are made to order. It is sold in boxes, with instructions accompanying each box, and costs the consumer 80 cents per pound, net. Manufactured by W. D. Allen & Co., No. 151 Lake street, Chicago, who desire agents in every town.



A



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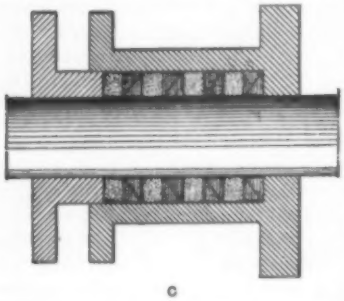

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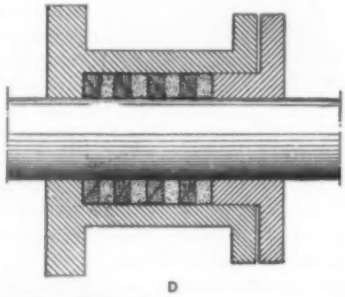

D

MAJOR J. ORTON KERBEY is now in Cuba pioneering for rubber. If he can discover plants or trees that produce the valuable milk, and it is not impossible, he will not only be a benefactor to the trade at large, but should profit by it personally.

SOME WANTS OF THE RUBBER TRADE.

THE following inquiries come to THE INDIA RUBBER WORLD from patrons. We shall be pleased to be able to place them in communication with parties able to supply their wants. Correspondence in regard to these inquiries should refer to them by number.

*

[6] A subscriber wants to know where "Gameo" rubber can be obtained.

*

[7] We have a request for names of manufacturers of rubber nipples for glass fillers for fountain pens.

*

[8] Several inquiries have reached THE INDIA RUBBER WORLD regarding where the "typewritists' thimbles" mentioned in the issue of this paper for October 1. One rubber house writes: "We have an inquiry from a customer for them." The data on which the publication was made have been misplaced, and nothing can now be added in this office to what was then printed.

*

[9] The American Electric Vehicle Co., No. 1545 Michigan avenue, Chicago, wish to get into communication with all the hard rubber manufacturers.

*

[10] "Could you give us the address, or put us in communication with, the different mills that manufacture rubber-coated drill and sheeting such as is used in bath cabinets? We have several deals on hand to dispose of a large quantity of this material, but must be taken from first hands at very close prices."

*

[11] A manufacturer of rubber specialties wants the address of a manufacturer of oiled silk.

ANSWERS.

[4] Montgomery Brothers (Philadelphia) write that they are in a position to do round or flat braid work by the mile. The Eastern Electric Cable Co (Boston) also state that they are prepared to do the work required by our correspondent.

THE PERCHOID INDUSTRY.

THE Rev. H. Martyn Hart, of Denver, Col., the patentee in this country of "perchoid," recently visited England in the interest of this material, which is being manufactured abroad under the name of "oxolin." He still expects to succeed in having it made in this country on a large scale.

The business of the Oxolin Syndicate, Limited, an English concern, has been bought by the British and Foreign Oxolin Co., Limited, with £100,000 capital, of which one-half is named as the purchase price. Charles J. Grist, the patentee in England, remains as managing director, with a list of technical advisers including George W. Taylor, the managing director of Tuck & Co., Limited.

Meanwhile Mr. Grist has been getting new patents, indicating a wide range of adaptability of his oxidized oil products. Patent No. 2868 (1898) relates to manufacture of blocks for use in paving roads and ways, carriage brake blocks, and for other like uses. Patent No. 2869 (1898) covers the use of the same materials in bicycle tires.

As yet the development of interest in the new material has made little progress in America.

BRIEF ABSTRACTS OF RECENT RUBBER PATENTS.

AMONG recent patents issued by the United States patent office, embodying applications of India-rubber or Guttapercha to a greater or lesser extent, have been the following. It is not practicable here to do more than to note the use of rubber sufficiently to enable those who may feel interested to decide whether or not to look into any particular patent more fully:

TIRES.

No. 616,901.—Inflatable Tire. Wilbur F. Cornelius, Indianapolis, Ind., assignor of one-half to William R. Brady, same place.

In an inflatable tire, the combination of a casing, a longitudinal opening in the casing within the tire-site in the rim, recesses in the rim, annular projecting flanges at or near meeting edges of the casing; adapted to engage with the recesses, an expanding or sealing tube, annular recesses at inner abutting edges of the casing conjointly forming a suitable annular chamber or receptacle for the expanding tubes, inwardly projecting annular lips or flanges adapted to overlap the expanding tube and incisions in the wall of the expanding tubes adapted to emit air into the tire for the complete inflation of the latter, and incisions being so located as to be completely covered or overlapped by the inwardly projecting lips.

No. 616,962.—Pneumatic Tire. Sidney Pattisson, London, England.

In a tire-fastener, the combination with a helical coiled spring having a conical portion at one end, the smaller part of the conical portion being at the end of the spring; of a wire provided with a screw-threaded end portion and thereby forming an adjustable prolongation of the wire, the socket also being provided with a conical end portion which engages with the conical portion of the spring and connects the wire with the spring.

No. 617,230.—Elastic Filling Material for Cycle Tires, etc. Julius Deborde, Berlin, Germany.

The process herein described of making a sponge-like filling for tires, saddles, cushions and other articles, which consists in subjecting a mixture of gelatin and glycerin to mechanical agitation, whereby it is changed into foam, introducing therein hollow elastic bodies, casting or forming the mass into suitable shape and cooling the same.

MECHANICAL GOODS.

No. 617,449.—Stair Cushion. Peter K. Saponoff, New York city.

A stair cushion comprising a layer of stiffening material, and suitable padding material, a waterproof jacket enveloping the cushion, and a cover upon the surface, and means for detachably securing the cushion to the tread of the step.

No. 617,472.—Water-Nozzle. Horace F. Neumeyer, Macungie, Pa., and Jonas F. Young, Niagara Falls, N. Y. Filed August 17, 1897. Serial No. 648,582. No model.

In a water-nozzle, the nozzle body having a discharge-tube provided with an inclined surface intersecting the discharge orifice thereof, a rotable outer tube fitted on the nozzle body over the discharge-tube thereof, a spraying-plate arranged between the two tubes, and means, carried by the rotable outer tube, for causing the spraying-plate to be moved onto or away from the inclined surface of the discharge-tube.

No. 618,126.—Hose-Reel Device. Charles Nuhring, Cincinnati, Ohio.

The combination of a hose-reel, an arm to which the reel is pivotally attached and a bracket adapted to attach the arm to a wall or other support in such position that the reel may be normally supported flat against the wall or thrown down to a horizontal position away from the wall and held in such position by gravity.

No. 617,319.—Elastic Tread Horseshoe. Arthur W. Crozier and George Smith, New York city.

In a horseshoe, the combination, with a shoe adapted to be fitted to the hoof in a heated state, the shoe being provided with heel-caulks and with a toe-caulk and with an inner and an outer marginal flange extending from the heel-caulks to the toe-caulks, and elastic pads fitted in the channels of the shoe formed by the caulks and the flanges therefore, the pads being provided with elastic caulks and eyelet-blocks fitted in the material of the pads between its elastic caulks, the eyelet-blocks being adapted to register with the nail openings in the shoe.

No. 617,625.—Mat. Arthur S. Allen, Boston.

A door-mat composed of a series of spring-coils crossing each other and embedded in elastic material.

No. 617,688.—Lawn-Sprinkler. Albert L. Lambert, Cleveland, Ohio.

In a lawn-sprinkler, a flat base, raised water chambers provided with central vent-opening, in combination with a curved shield adapted to direct the flow of the jet, and means for attaching the shield to either side of the sprinkler, consisting of integral pins of angular section, and an angular aperture in the shield.

DRUGGISTS' SUNDRIES.

No. 616,963.—Syringe-Nozzle. Eugene T. Pearl, New York city.

As an improved article of manufacture, the syringe herein described, consisting of a soft-rubber bulb, a rubber nozzle having its bore of uniform diameter throughout, and a deflector rigidly secured within the discharge end of the nozzle, and consisting of a disk having radial slits and portions between the slits bent at an angle to form wings affording spiral passages between them, with the central portion of the deflector imperforate and at right angles to the bore of the nozzle, whereby the liquid is forced in an inclined direction through the passages surrounding the central solid portion of the deflector and discharged with a whirling motion uniform throughout the whole of the discharge end of the nozzle.

No. 617,127.—Syringe. Camillo Savino, New York city.

As an improvement in syringes, the combination of a tubular neck portion having an enlarged exteriorly threaded middle section and anchoring stems or end sections; a bulbous body section, a flexible nozzle section, a cap provided with a seat for the point of said nozzle and an interiorly threaded rim, and means carried by the stem or end sections for engaging the body and nozzle and thus holding them in operative union with each other.

No. 617,495.—Pistol for Squirting Liquids. Gustav Reimann, Nimptsch, Germany.

In a pistol-shaped instrument for squirting out liquids the combination of the hollow handle containing the rubber ball having an air-inlet valve, the trigger provided with plate for compressing the rubber ball and trigger spring, an arm projecting from the trigger and carrying the head, a connecting tube, a piece for depressing the upper wall of the connecting-tube, a plug and a pointed barrel.

No. 617,929.—Finger Shield or Protector. Otis E. Fowble, Los Angeles, Cal., assignor of one-half to Charles C. McLean, Philadelphia.

As a new article of manufacture, a finger shield or protector consisting of a tubular body composed of vulcanized India-rubber or similar material, adapted to fit over the tip or end of a finger or thumb, and having an opening in the end or tip thereof and an opening in the back or rear portion to register with the knuckle or joint of a finger or thumb whereby the shield is permitted to bend at the joint.

BOOTS AND SHOES.

No. 618,127.—Heels For Boots or Shoes. Humphrey O'Sullivan, Lowell, Mass., assignor to O'Sullivan Brothers, same place.

As an article of manufacture a heel for boots or shoes, comprising an elastic top lift having burs or washers embedded therein and a leather lift, the top lift and leather lift being united by insoluble cement the whole being adapted to be secured to the heel of a boot or shoe by nails passing through the embedded washers.

No. 618,128.—Safety-Heel. Humphrey O'Sullivan, Lowell, Mass.

As an article of manufacture, a top lift of elastic material for heels for boots or shoes, provided with suction recesses in its outer face extending partially through the thickness of the lift and having burs or washers embedded in the lift concentrically with and under the recess, adapted to receive nails or screws to secure the lift to the body of the heel.

DENTAL RUBBER.

No. 618,166.—Composition of Matter for Producing Enamel for Refixing Dental Plates of Artificial Teeth. Thomas Clarke, Interlachen, Switzerland.

The improved composition of matter for the production of an enamel consisting of one and a half parts (by weight) of dental rubber dissolved in machine-oil and scented with attar-of-roses, five parts of yellow gum-shellac, three parts of plaster of-paris reduced to a fine granular form and colored with carmine, three part of rectified spirits of wine, and one-twentieth part of pure Condy's fluid.

MACHINERY.

No. 616,917.—Sole-cutting Machine. Carey E. Goddard, Malden, Mass., assignor to the Boston Rubber Shoe Co.

In a sole-cutting machine, a cutting-form holder, a leader provided with the longitudinal slot, a holder lying on the surface of the leader, a connection rigidly connecting the holder and cutting-form holder through the slot in the leader; a spindle and tube or sleeve, a knife-block mechanism including a jointed arm and hub therefor, having its bearings on tube or sleeve; a horizontal disk, rigidly secured to and around the hub and provided with curved slots; an eccentric ring adjustably secured through one of the slots to the disc, an eccentric ring encircling the eccentric and adjustably secured through one of the slots to the disk; and structures mounted on the leader, and engaged by the opposite surfaces of the outer eccentric ring whereby adjustable longitudinal reciprocation is imparted to the leader as the knife passes through the cutting form holder.

No. 617,031.—Machine for Repairing Pneumatic Tires. Frank W. Maxon, Rochester, N. Y.

A tire repairing machine, comprising a stationary steam-chamber and a coacting movable steam-chamber, with means for supplying steam to the chambers, and for operating the movable steam chamber and two flexible steam pipes, having one end of each connected with the two opposite sides of the movable steam chamber, their other ends being connected with the stationary steam chamber, the pipe forming substantially semicircles around the steam chambers and crossing at the rear thereof.

No. 617,414.—Vulcanizing Apparatus. Henry J. Doughty, Providence, R. I.

The combination with a vulcanizer, comprising an upper and a lower platen, means for heating the platens, a separable mould adapted to be inserted between the platens, a hollow inflating-needle detachable from the mould and adapted to extend into the chamber thereof, and means for automatically placing the inflating-needle into communication with a source of supply of fluid under pressure when the mould is inserted into the vulcanizer.

No. 618,482.—Apparatus for Repairing Pneumatic Tires. Warren H. Beede and Frederick W. Wright, Lynn, Mass.

In a device of the character specified, a casing having a heating member, the casing having a cavity in the outer face of its top, a member movable toward and away from the top of the casing and having provision for receiving and holding a lug, and reversible coöperating clamping members, each member having a lug upon its outer face, whereby in either position of the clamping members the lug of one member is engaged by the movable member while the lug of the other clamping member rests in the cavity in the top of the casing.

MISCELLANEOUS.

No. 616,873.—Artificial Leg. William Andrews, Lowell, Mass.

The combination of the core, an elastic covering therefor of the external shape of the natural foot, and a toe-spring arranged in said covering and extending from a point in front of the core above and below the core and consisting of cords, arranged at intervals in a layer and extending longitudinally and transversely of the spring and embedded in hard rubber, the hard rubber covering the layer on both sides and filling the interstices between the cords.

No. 617,025.—Head-Rest. Harold M. Joss, Chicago, assignor of two-thirds to James S. Shortle, same place, and Frederick A. Joss, Indianapolis, Ind.

A head rest including a pair of side supports and an air tight rubber tube, mounted on such supports and extending from one to the other in a curve.

No. 617,796.—Rubber Ball. Granville W. Wright, New Haven, Conn.

A rubber ball made up of segments cut from sheet-rubber having coloring matter incorporated therein, the segments being united at their edges, and the ball having interior balancing buttons, substantially as described.

No. 618,267.—Gum Elastic Top for Stockings. Robert Gutsche, Philadelphia.

As a new article of manufacture, the herein-described garment having a terminal opening, consisting of a knitted body portion of ordinary yarns and an elastic strip composed of interwoven yarns and gum-elastic strands the strip having its ends secured together and having one end secured to the knitted body portion, thus forming an elastic webbing of woven material around the terminal opening.

TRADE MARKS.

No. 32,379.—Seamless Rubber Gloves. The Miller Rubber Manufacturing Co., Akron, Ohio. Filed November 2, 1898.

Essential feature, the representation of a human hand and the larger part of the fore arm, with a close-fitting glove covering the hand and part of the arm and leaving a distinct portion of the arm above exposed. Used since May 1, 1898.

No. 32,405.—Rubber Boots and Shoes. Lambertville Rubber Co., Lambertville, N. J. Filed December 24, 1898.

The words "Cock of the Walk," used since January 1, 1890.

No. 32,406.—Rubber Boots and Shoes. Lambertville Rubber Co., Lambertville, N. J. Filed December 24, 1898.

The words "Top Sawyer," used since December 5, 1898.

No. 32,454.—Rubber Tires. Milwaukee Patent Puncture Proof Tire Co., Milwaukee, Wis. Filed April 22, 1898.

DESIGNS.

No. 29,949.—Golf-Ball. George A. Barnes, Akron, Ohio, assignor to the Whitman & Barnes Manufacturing Co., same place. Filed November 17, 1898. Serial No. 696,733.

No. 29,972.—Syringe Nozzle-Tip. Elisha L. Day, Brenham, Texas, assignor of one-half to Robert E. Graul, same place. Filed December 19, 1898. Serial No. 699,772.

No. 29,998.—Elastic Tire. Robert Cowen, Cambridge, Mass. Filed December 12, 1898. Serial No. 699,078.

No. 30,023.—Syringe. Eugene Tullar Pearl, New York city. Filed December 23, 1898. Serial No. 700,173.

No. 30,037.—Bicycle-Tire Protector. Karl William Haak, Texarkana, Ark. Filed November 17, 1898. Serial No. 696,692.

No. 30,040.—Heel. Robert McKay, Detroit, Mich. Filed December 21, 1898. Serial No. 699,961.

NEWS OF THE RUBBER TRADE.

THE Tuttle-Smith Co., wholesalers of shoes and rubbers, Boston, incorporated with $100,000 capital, made an assignment on February 16 to F. C. Hood, of the Hood Rubber Co.; E. P. Tuttle, treasurer of the company; and John S. Kent. The liabilities are stated at $250,000, with nominal assets of the same amount. The firm expect to arrange for the continuance of the business. Allen Edmester, who formerly was in charge of the rubber department of this store, has organized the firm of Allen Edmester & Co., who will engage in the rubber jobbing trade at No. 303 Congress street, Boston, carrying a line of "Hood" and "Old Colony" rubbers.

=The Goodyear Rubber Co. have removed their stock from the Minneapolis store to the St. Paul store, and the business heretofore transacted from the Minneapolis store will be attended to at St. Paul, James Suydam, who has so long been manager at the latter place remaining in that position. Two large additional floors have been rented in a building adjoining the St. Paul store. The company will maintain an office and sample room in Minneapolis, in charge of J. J. Tallmadge, who was formerly manager of the store in that city, and who will also be in charge of the mechanical goods and druggist's sundries departments at St. Paul.

=The Gormully & Jeffery Manufacturing Co. (Chicago) are reported to be making an application for a license under the "Clincher" tire patents of the North British Rubber Co. It will be remembered that the "G. & J." company were restrained from infringing the "Clincher" patent in Great Britain, in an action which was carried through to the House of Lords, though they were successful in the trial of a suit in relation to the same patents in the American courts.

=The Combination Boot and Shoe Co. (Woonsocket, R. I.) have sold plant, patents, and good will to the United States Rubber Co. and the machinery has been removed to the Millville factory of the Woonsocket Rubber Co. The company consisted of Parker J. Buxton and John Shambow and their business consisted in attaching leather soles to rubber boots and shoes. As their work was confined mainly to soling Woonsocket boots, it was considered more economical to have all the work done under the same management, and hence the sale. John P. Nealon, foreman, will continue in charge of the work.

=The Union Rubber Co., who do a large business in mackintoshes and cravenettes and whose warerooms are at No. 65 Essex street, Boston, have just completed a fine plant in Milford, Mass., where they will hereafter do their own proofing. The factory is equipped with washers and grinders of Birmingham make; the spreaders being supplied by the American Tool and Machine Co. (Boston). Part of the equipment is some seventy-five Wheeler & Wilson sewing machines.

=The three story addition to the Goodyear Rubber Co.'s factory, at Middletown, Conn., lately completed, has been equipped with automatic sprinklers.

=At the annual meeting of the Rubber and Celluloid Harness Trimming Co. (Newark, N. J.), in January, Andrew Albright was reëlected president and Thomas M. Kays secretary. The usual semi-annual dividend was declared.

=James F. Casey, who was admitted to partnership in the Bridgeport Elastic Web Co. (Bridgeport, Conn.) on January 1, has gone to San Francisco to establish an agency for the sale of the company's goods.

=The new office arrangements of the United States Rubber Co. (Boston) are going to be ideal. They will consist of a large sample room, a customers' room, a room for the directors, and a private office for the selling agent, Chester J. Pike, all finished in oak. Frank D. Balderston, who is Mr. Pike's first lieutenant, will have very comfortable quarters under the new arrangement and will continue to do great work in the tennis department. Under the new office organization, Mr. Reeve will be at the Wales-Goodyear factory part of the time each week; Mr. Walsh will be at the Woonsocket factory, and Mr. Charles W. Barnes at the American factory. Mr. Barnes, however, will be found the major part of the time at the Boston office. The main offices, where are the assistants, bookkeepers, and stenographers, will be arranged somewhat as before, except that the platform before the great windows will be taken away and the desks moved where they will be most convenient for the special work there done.

=The Straus Tire Co. (No. 127 Duane street, New York) have been appointed selling agents for the Scott-Rogers detachable bicycle tires, described in THE INDIA RUBBER WORLD for February 1.

=The directors of the Seamless Rubber Co. (New Haven, Conn.), at their meeting on January 18, declared a 5 per cent. dividend from the earnings of the previous six months.

=Judgment has been given in favor of Morgan & Wright (Chicago) in a suit for $1,000,000 brought by an English promoter named Joseph, who estimated this as the amount which he would have cleared by the flotation of a company to buy the Morgan & Wright patents in England, under a contract which he claimed to have with the company named. The case was tried in England, where Morgan & Wright's solicitor contended that they had attempted to find a purchaser for their English patents, but had not proposed to be a party to the promotion of any company.

=It is reported that A. C. Woodward is going out of the business of manufacturing elastic fabrics at North Abingdon, Mass., and will consolidate with John L. Morgan, of Chelsea, Mass., the combined business to be carried on at some point not yet decided upon.

=Several Canadian towns are anxious to secure the location of the new factory of the Toronto Rubber Shoe Manufacturing Co., the old one having burned in January. Peterborough, near Ottawa, is mentioned particularly.

=The Columbus Rubber and Belting Co. (Columbus, Ohio) advise THE INDIA RUBBER WORLD of a change in their name to the Columbus Mill and Mine Supply Co., for the reason that the old name was felt to be a detriment to them in handling iron and steel mining supplies, which has come to be the principal part of their business. They still handle belting, packing, and hose, but to a limited extent.

=James G. Biddle (Philadelphia), who makes a specialty of apparatus for testing resistance, insulation, and capacity of cables, has received an order from the United States signal service for outfits to be placed on a cable ship about to be despatched to Manila, to lay the submarine cables mentioned in THE INDIA RUBBER WORLD for February 1.

=The Toledo Rubber Co. (Toledo, Ohio), on account of a steady increase in their trade, necessitating larger and more convenient quarters, have become established in a new store, at No. 418 Summit street.

=The National Cycle Board of Trade have filed with the secretary of state of New York a certificate of dissolution. Doubtless the reasons for the existence of such a body have been lessened by a decline in the number of bicycle manufacturers. A cycling journal notes the disappearance from the trade of forty firms who were exhibitors at the Madison Square cycle show two years ago.

=A petition has been granted for the removal from the Massachusetts superior court to the United States courts of the suit of the B. F. Goodrich Co. *v.* Humber & Co., Limited—noticed in the last INDIA RUBBER WORLD—on the ground that the defendants are residents of England, a foreign country.

=F. D. Balderston, first assistant to Sales Agent Chester J. Pike at the Boston office of the United States Rubber Co., is planning for a heavy trade in tennis goods this spring.

=John Walsh, who for years has been connected with the Boston office of the Woonsocket Rubber Co., has now been made factory manager. He will spend two days at the factory in Woonsocket and the rest of the week at the Boston office of the United States Rubber Co. No better man to oversee styles, stock, etc., could have been selected.

=Winfield S. Knowles, manager of the Globe Rubber Works (Boston), has already booked large orders of hose for spring delivery and in spite of the big snow storms confidently predicts a genuine hose season for 1899.

=The Goodyear's India Rubber Glove Manufacturing Co are preparing for a largely increased output of their incomparable footwear next season. It certainly pays to make good goods.

=Chapman & McLean (Butler, N. J.), who are doing a fine business in dress shields, are especially well equipped for their venture into general mechanical lines. Mr. Chapman spent thirteen years in the office of the Butler Hard Rubber Co., while Mr. McLean had an equally long and valuable experience as the assistant superintendent of the factory. Both are young men, are hard workers, in love with the business, and have plenty of capital. They employ seventy-five hands at their factory.

="Plickings from Plucks" is the odd title of a neat little folder that tells of the virtues of the "Alpha" syringe, made by Parker, Stearns & Sutton (New York).

=At the annual meeting of the Cable Rubber Co. (Boston) William J. Cable was elected president and Samuel H. Cable, secretary.

=J. N. Gardner, formerly manager of the Rhode Island Coupling Co. (Providence, R. I.), is now connected with the Mechanical Fabric Co., and is doing excellent work with Mr. Friswell in designing novel and effective advertisements.

=A neat white box, decorated with an American flag and bearing no firm name on the outside, but having three samples of knit fire hose on the inside, is what the American Fire Hose Co. (Chelsea, Mass.) are sending out. It is a most effective bit of advertising.

=A. C. Eggers, manager of the druggists' sundries department, of the Goodyear's India Rubber Glove Manufacturing Co., is West on a month's trip, with new samples bearing the stamp of the Glove company, turned out by so expert a manufacturer as Mr. Schaffer, with all of the experience and trade knowledge that Mr. Van Vliet has doubtless equipped him. If he doesn't land orders till the company are snowed under with them it will be a latter day marvel.

="High Pressure" and "Pioneer" cements are being pushed in a way that makes old houses in the sticky line open their eyes. These cements are marketed by the National Cement and Rubber Manufacturing Co. (Toledo, Ohio.)

=The Standard Paint Co. (New York) have built and equipped a large factory in Hamburg, Germany, for the manufacture of their specialties—among others, Ruberoid and Ruberine.

=Bailey's patent ribbed back rubbers have sold more this year than ever before. Indeed, the call has been so great that it has been impossible at times to supply the goods.

=The Plymouth Rubber Co. (Stoughton, Mass.), with their new equipment, are able to turn off from 8000 to 10,000 yards of proofing a day.

=Pinking machines are used to cut the strip of rubber that binds the edge of a water bottle. A few years ago this strip was cut by hand. The Cruikshank Engine Works (Providence, R. I.) are furnishing the trade with machines to-day.

=The hardware and plumber's reminder sheet is a happy thought. It is a small poster on which is printed more than a hundred pictures of rubber goods such as are sold in the trades named. Each cut is numbered, and F. C. Howlett & Co. (Buffalo, N. Y.), who send out the sheet, give full information regarding quality, prices, etc., of the numbered goods.

=Word comes from the La Crosse Rubber Mills Co. (La Crosse, Wis.) that business is so brisk that the mixing and spreading departments are running twenty hours a day to keep up with orders.

=L. C. Chase & Co., describe their new method of setting tires thus: "No notes, no promises, cash, good profits, busy."

=The aluminum last is winning its way.

=Mr. W. E. McKee, president of the M. & M. Manufacturing Co. (Springfield, Mass.), manufacturers of white rubber neckwear, has obtained a patent on a white rubber dress tie that is said to be just the thing for evening wear.

=Picher sublimed lead is growing to be a household word, if the expression is correct, in the rubber mills of the United States. In mechanical lines especially the Picher Lead Co. have scored an enviable triumph.

=W. D. Allen & Co. (Chicago) are proud of the fact that theirs is the only packing factory manufacturing braided and woven packings west of Philadelphia. There was one in Pittsburgh, and later another in Chicago, but both failed and the machinery was purchased by the enterprising company who now survive all others.

=William R. Thropp (Trenton, N. J.) is right in the business of making presses for rubber work. He has finished twenty-five double decked presses for the Home Rubber Co., thirty for the Empire Rubber Manufacturing Co., and six five-plate presses for the Globe Rubber Co.

=H. A. Middleton, formerly superintendent at the Chelsea factory of L. C. Chase & Co., has been engaged by the India Rubber Co. (Akron, Ohio) in a similar capacity.

=John J. Voorhees was always a busy man and a jolly one. The work that the Voorhees Rubber Co. are turning out now makes him busier than ever, but not a whit less cheerful.

=Mouthaan & Co., of Amsterdam—and it is well to make a note of the name—are still writing to American rubber houses for samples and later sending orders. Most of the firms receiving their orders are holding them until the cash arrives, partly on account of an article on "Fraudulent Buyers Abroad" that appeared in THE INDIA RUBBER WORLD for January 1, having reference particularly to the Amsterdam concern here named.

=Morgan & Wright (Chicago) do not confine their attention, by any means, to bicycle tires. They have been making rubber for stamp manufacturers for over fifteen years.

=A shutdown at the factory of the United States Rubber Co.—the old Jersey company's plant—(New Brunswick, N. J.) began on Monday, February 13.

=At the recent trial of the solid rubber tire infringement suit of the Rubber Tire Wheel Co. *v.* the American Rubber Tire Co., in the United States circuit court, the fact was developed that the sale of such tires had increased more than 400 per cent. during 1898.

=The B. F. Goodrich Co. (Akron, Ohio) have opened a Detroit branch at No. 303 Woodward avenue, in charge of Charles H. Kelly, who had charge previously of their St. Louis branch.

=The New Jersey Car Spring and Rubber Co. (Jersey City, N. J.) have issued a new catalogue of rubber mats and mattings which they manufacture. The catalogue is almost entirely given up to illustrations and descriptions, together with price lists, of mats and mattings for a great variety of purposes. Illustrations are given of a variety of shapes and patterns of plain and monogram mats for floor use, corrugated stair treads, street car step treads, carriage mats, table mats, coins mats, as well as a miscellaneous line for barbers and dentists and other uses. The catalogue contains 48 pages, with 67 illustrations. The company will be glad to send it upon request.

=The heaviest losers by a fire in Troy, N. Y., on February 13, were D. Klock, Jr., & Co., dealers in rubber goods. Their stock, valued at from $60,000 to $70,000, is reported practically destroyed, but it was well covered by insurance. They rented another store the next day and are continuing business.

=Notices were posted at the "Alice" mill of the Woonsocket Rubber Co., on February 15, of a two weeks shutdown, beginning Monday, February 20. It was understood at Woonsocket that the boot factory at Millville, Mass., would not be closed.

=A shutdown at the Wales-Goodyear rubber shoe factory, at Naugatuck, Conn., began on Monday, February 13, without any announcement of the date for resuming work.

=The Canadian Rubber Co. of Montreal have sent out a circular withdrawing all their quotations on mechanical goods, owing to the continued advance in raw materials. This does not apply to their line of footwear.

=The Mechanical Fabric Co.'s (Providence, R. I.) petite calendar is somewhat of a departure from the general run of dainty booklets. It is not only a calendar and stamp book, but one fly leaf is devoted to pins and needles, while in a dainty red morocco pocket in the other are some strips of court plaster, in front of which is the legend in gilt: "You stick to me and I'll stick to you." The only trouble about advertising of this kind is that the man who receives it rarely keeps it because of the covetousness of all beholders.

=The Baltimore Rubber Co. recently bought the entire stock of mackintoshes of The W. H. H. Peck Co. (Cleveland, Ohio), and offered the same at special sale in their Charles street store.

=The Boston Belting Co. report a steady gain in the demand for their "Phœnix" red packing, for flanges and joints, particularly where acids or high pressure steam are used.

=Frank S. Whitcher & Co., patentees and manufacturers of the "Velvet" rubber heel, are sending the following circular to the trade: "An attempt is being made through various publications to impress upon the public and the trade the fact that a monopoly has been secured, by recently granted letters patent, embracing all rubber heels provided with washers or metal embedded therein through which the securing nails pass. We beg to inform the trade that our 'Velvet' rubber heels are in no wise an infringement of any valid letters patent, and we are prepared to prove our statements and will do so whenever it becomes necessary. We fully guarantee the sellers and users of our Velvet Rubber Heels against all loss or damage resulting from the alleged infringement of any patent or patents."

=Those who like a good big calendar, and many do, should write the Weld Manufacturing Co. (No. 41 Lincoln street, Boston) for theirs. If the inquirer uses buckles either for arctics, clothing, garters or any other purpose, he is likelyto be promptly attended to.

=The Sterling Rubber Co. (No. 51 Summer street, Boston) are putting upon the market a line of sponge bags and novelties in rubber that are artistic and cannot fail to catch the eye of the buyer. In these and their regular lines of mackintoshes and sundries they are doing a constantly increasing business.

=Although the fire at the factory of the Crescent Insulated Wire Co.'s factory (Trenton, N. J.) was quite serious, the firm with characteristic energy have pretty effectually removed all trace of it and will soon be running full time again.

=The latest Goodrich girl (lithograph) is named "Vivian," and is certainly a beauty. To be appreciated it must be seen, and only a poet's pen can fitly describe it.

=Now that reclaimed rubber is so high, numbers of the manufacturers here and abroad are looking into the virtues of Rubberoid. The gum has been known for a number of years and stands every test. One reason that it has never been widely introduced is because other specialties of the Standard Paint Co., have practically monopolized their factory. With a new mill in Germany and increased equipment at home, they are now ready to take orders in any amount.

IMPROVING TRADE IN COLORADO.

THE Denver Rubber Co. advise THE INDIA RUBBER WORLD, in response to an inquiry, that the year 1898 showed a decided and satisfactory increase over former years, with regard to the rubber goods trade in Colorado. They attribute this to their efforts in pushing trade, and add:

"Acting as the selling agents for the B. F. Goodrich Co., in their line of sundries and mechanicals, has also been a large factor in our increase of trade. The trade in mackintoshes has increased largely in jobbing to outside towns, but owing to the tropical clime in which Denver is located, its perpetual sunshine and freedom from storms, the city trade in this line has not increased to any extent. Such is our misfortune in living in the banana belt of Colorado. We are not handling rubber footwear. We are pleased to see a demand for better grades of goods, which we believe is due to the general prosperity of the state and the magnificent record of Colorado's mineral output which leads the world."

THE RUBBER TRADE ON THE PACIFIC.

THE success of the Goodyear Rubber Co. on the Pacific coast is illustrated by a comparison, in the San Francisco *Bulletin*, between the obscure store in which they began business out there in 1864, and their present extensive quarters—Nos. 573, 575, 577, and 579 Market street, running through to Stevenson street. A complete line of goods is carried, the San Francisco store, in charge of Mr. Richard H. Pease, having control of the company's trade in California, Arizona, New Mexico, Nevada, and Utah. The company's Portland house covers the whole northwest, including British Columbia. The company continue to advertise "Union India Rubber Co." goods, which were first introduced on the Pacific slope by the "forty-niners," the inference being that a trade mark or brand must have merit when it helps the sale of goods for fifty years.

BOSTON BELTING CO. IN ST. LOUIS.

UNDER date of February 5 the Boston Belting Co. announce that they have withdrawn the agency for the sale of their goods from the Simmons Hardware Co., St. Louis, who are no longer authorized to solicit orders for their manufactures. The Boston Belting Co. have made arrangements with the Railway

Supply Co., No. 11 North Sixth street, St. Louis, to represent them in a large portion of the territory formerly covered for them by the Simmons company. The Railway Supply Co. will carry a stock of the goods, and will be in position to fill orders promptly and at bottom factory prices. Their familiarity with mechanical rubber goods and the various purposes for which they are used is referred to. The company named do a general railway supply business, handling supplies both for the operating and construction of railroads, together with supplies for foundries, mills, and machine shops. They are agents in St. Louis for eleven important concerns besides the Boston Belting Co.

NEW INCORPORATIONS.

THE Indiana Shoe and Rubber Co. (Indianapolis), under Indiana laws; capital, $50,000. President: W. J. Nicholson; vice president: Hughes Mason; secretary and treasurer: C. N. Crowder. Organized to succeed the Indiana Rubber Co. THE INDIA RUBBER WORLD is advised that they "will carry a largely increased stock of rubbers and will add a complete line of real snappy up-to-date specialties in leather boots and shoes. The stockholders of the new concern are all practical shoe men of experience and have been successful in their business enterprises, and the outlook is promising for the new firm." Mr. Mason was president of the old company.

=The Brendel Spring Tire Co., under New Jersey laws; capital, $50,000. Incorporators: August Lohse (president); John Keir (vice president); John C. Klett (secretary); Michael Brendel (treasurer). Factory: No. 509 West Twenty-eighth street, New York; principal office, No. 369 Central avenue, Jersey City, N. J. The object is the manufacture of a rubber encased helical spring tire. Robert W. Wright is general manager.

=The Pan-American Rubber Co. (Portland, Me.), under Maine laws; capital, $1,000,000, with $500 paid in. President: A. J. Desmond, Portland; treasurer: Edward K. Milliken, Deering, Me. To deal in crude rubber.

=The Artificial Rubber Co., under New Jersey laws; authorized capital, $1,000,000. Incorporators: Charles F. Lumb and William E. Sharps, No. 515 Drexel building, Philadelphia; Thomas M. Curley, No. 552 Federal street, Camden, N. J. Messrs. Lumb and Sharps are officers in the Gilchrist Jar Co., manufacturers of patented preserving jars. The former writes to THE INDIA RUBBER WORLD, in response to an inquiry: "I will comply with your request at an early date. At present, however, I can give you no definite information." The charter authorizes the company to manufacture and deal in artificial rubber and rubber substitutes.

=The American Commercial Rubber Co. (Elizabeth, N. J.), under New Jersey laws; capital, $250,000. Incorporators: Charles F. Hart, Jacob Meloth, and Henry A. Rath, all of Elizabeth. It is their intention to occupy the plant of the Pacific Rubber Co., incorporated in 1894, and now in liquidation, negotiations now being under way with the receiver of the latter, Meline W. Halsey. To manufacture mackintoshes and proof for the trade.

INDIVIDUAL MENTION.

MR. GEORGE A. ALDEN will start on the 4th of this month on a month's voyage to southern waters on the *City of Paris*. He will take a look at Porto Rico and Trinidad and incidentally call on his agents in the cacao trade.

=Mr. Frederick L. Rider, secretary of the Boston Rubber Shoe Co., has cut loose from business and gone for a six weeks' tour in Europe—a much-needed rest. Mr. John W. Knott, of London, now European representative of all of the rubber footwear manufactured by the United States Rubber Co., returned home on the same steamer.

=The latest addition to the study of the Editor of THE INDIA RUBBER WORLD is a fine steel plate likeness of Mr. John D. Vermeule, president of the Goodyear's India Rubber Glove Manufacturing Co.

=Mr. N. J. Whitehead, of the Keystone Rubber Works (Erie, Pa.), was a recent caller at the office of THE INDIA RUBBER WORLD.

=Mr. W. N. Swain, formerly manager of the Clifton Rubber Manufacturing Co. (Boston) has opened an office in that city as expert on titles. With that line of work and the care of various estates he is doing an excellent business.

=Mr. James F. Brook, formerly of Brook, Oliphant Co. (Trenton, N. J.), is now in San Antonio, Texas, in the position of consulting engineer and purchasing agent for the San Antonio Machine and Supply Co.

=It is so big a secret that it simply would out in spite of the distaste that the central figure in it has for newspaper notoriety. The secret is this: President S. H. C. Miner, of the Granby Rubber Co., has always made a study of mining propositions, partly because of his taste for that sort of relaxation, and partly because of property interests of that kind. When the great mineral wealth of British Columbia began to dazzle the outside world it was found that Mr. Miner and his associates had purchased claims that are rich in gold, silver, and copper almost beyond price. Not luck but foresight.

=Late Springfield (Mass.) newspapers mention a fine string of trout caught recently by Mr. James H. Breck, of that city, and displayed in a window of the Goodyear Rubber Store, of which Breck Brothers are proprietors.

=The Editor of THE INDIA RUBBER WORLD is in receipt of a cordial invitation from the Buffalo Canoe Club to join them in their annual dinner and reunion, and it is with real regret that he finds himself unable to attend. The invitation comes through Mr. Walter A. Clapp, of F. C. Howlett & Co., who has the enviable reputation of one who always remembers his friends.

=William E. Carr visited THE INDIA RUBBER WORLD office recently, fresh from the rubber fields on the Tapajós, a branch of the Amazon, where he has spent several years. He reports a rapid but substantial growth in Pará; that the rubber forests are not destroyed by being tapped year after year; and that a good field exists for a wide range of small medium priced or cheap articles of American manufacture, the market being controlled thus far mainly by Europeans. Mr. Carr, who is a native of Kentucky, found no difficulty in keeping his health in the district referred to.

=Mr. J. H. Seiberling, president of the Indiana Rubber and Insulated Wire Co. (Jonesboro, Ind.), was a recent caller at the office of THE INDIA RUBBER WORLD.

A BOOK FOR THE RUBBER FACTORY.

ALL classes of workers in rubber will have reason to feel interested in a forthcoming new book, to be entitled "Crude Rubber and Compounding Ingredients." Factory superintendents and others often ask for a book, written from a practical standpoint, fitted to serve as a guide to their work, but hitherto no such publication existed. The new work will embrace a list of grades of rubber, with a description of the characteristics of each, and also of several hundred ingredients which have been used in rubber compounds. Further particulars with regard to the book appear on page xviii, in the advertising department of this paper.

WELL REMEMBERED IN ENGLAND.

"WE well remember," says *The India Rubber-Journal* (London), "the account of an association in rubber galoshes in the United States of America, some years ago under whose rules any member selling below the association's fixed prices should pay a fine of $2000. One member transacted an enormous business below the said prices. It at once came to the ears of the association, who convened a special meeting to deal with the offender, and it was considered that the delinquent would only be able to face them with quivering limbs and as a disgraced and ruined man. Oh! no, the gentleman (?) came up as bold as Nebuchadnezzar when he went to grass, and said: 'I admit my guilt; there is the check for $2000, to which you are heartily welcome.' This circumstance led to the immediate dissolution of the association."

A LEADING firm of brokers in Broad street advise THE INDIA RUBBER WORLD under date of February 25: "We regret that we have been unable to obtain information on Rubber Goods Manufacuring Co., as they issue no prospectus, and the officers are very reticent. The stocks closed to-day at 30-31 for Common and Preferred offered at 81, with no bid."

RUBBERS ARE "GOOD FORM."—Everything that conduces to health is now good form. For instance, in the matter of wearing rubbers. A few years ago a good many women objected to wearing rubbers on the ground that they detracted from the trim appearance of the foot. But everybody knows that nothing else ruins the health as quickly as wet feet, and the only possible way to have dry feet—especially in winter—is to wear rubbers. So rubbers have come back into style as an indispenble adjunct to good health.

REVIEW OF THE CRUDE RUBBER MARKET.

NEW YORK, February 27, 1899.

THE market has continued firm since our report, with the exception of a brief period of inactivity during and immediately after the severe storm which began about the middle of the month. That event, by the way, was welcomed by the rubber shoe dealers, having a tendency to clean out their stocks, though it came too late in the season to affect the business of the shoe factories, several of which were preparing for their annual shutdown. Other lines of consumption continue active, maintaining the demand for rubber, and a like condition exists abroad. The receipts of rubber at Pará were heavy during the month, amounting, at the latest advices, to 4540 tons, against 2680 tons for the whole month of February in 1898, and 2800 tons in February, 1897. The arrivals at Pará for the crop year up to the beginning of the month, were smaller than usual, on account of the delayed movement earlier in the season, due to low water in the upriver districts. The Pará receipts from July 1 to February 1 were only 14,215 tons, compared with 14,215 tons to the same time in 1898 and 14,750 tons to the same time in 1897. But the total for the present season have now been brought up to 18,755 tons. It is believed that practically all the delayed shipments have now reached Pará. There is, however, nothing in the situation to suggest the probability of lower priced rubber, either for Pará grades or for Africans. On the contrary, the two auctions at Antwerp during February each showed a strong advance over preceding sales. It is of interest to note that the exports of crude rubber into Germany during the past year exceeded the exports by 16,855,080 pounds, compared with 13,848,780 pounds in 1897, indicating an increased consumption in that country for the year of about 3,000,000 pounds. All reports are to the effect that an increased consumption is in progress abroad as well as in America, with no indication of a falling off. One evidence of activity in the rubber industry is afforded by the unprecedented high cost of rubber scrap. The transactions that are now being made in old boots and shoes are to a certain extent secret, but there are reports of sales at 7½ cents, and even as high as 8 cents, for carloads.

The latest quotations in the New York market are:

PARÁ.			
Islands, fine, new	98	@99	
Islands, fine, old	100	@101	
Islands, coarse, new	69	@70	
Islands, coarse, old	none here		
Upriver, fine, new	100	@101	
Upriver, fine, old	102	@103	
Upriver, coarse, new	87	@88	
Upriver, coarse, old	none here		
Caucho (Peruvian) sheet	70	@71	
Caucho (Peruvian) strip	72	@73	
Caucho (Peruvian) ball	82	@83	
AFRICAN.			
Tongues	64	@65	
Sierra Leone	none here		
Benguella	74	@75	
Congo ball	66	@67	
Cameroon ball	64	@65	
Flake and lumps	44	@45	
Accra flake	26	@27	
Accra buttons	68	@69	
Accra strips	71	@72	
Lagos buttons	67	@68	
Lagos strips	68	@70	
Liberian flake		@	
Madagascar, pinky	85	@86	
Madagascar, black	none here		
CENTRALS.			
Esmeralda, sausage	75	@76	
Guayaquil, strip	63	@68	
Nicaragua, scrap	74	@75	
Mangabeira, sheet	57	@58	
EAST INDIAN.			
Assam	84		
Borneo	40	@54	
GUTTA-PERCHA.			
Fine grade		1.50	
Medium		1.30	
Hard white		1.00	
Lower sorts		50	
Balata			

Late Pará cables quote:

	Per Kilo.		Per Kilo.
Upriver, fine	10$600	Islands, fine	12$000
Upriver, coarse	6$700	Islands, coarse	9$600

Exchange 7 *d.*

STATISTICS OF PARA RUBBER.

FOLLOWING is a comparison for corresponding periods of three years, the figures denoting tons of 1000 kilograms:

NEW YORK.	Fine and Medium.	Coarse.	Totals. 1899.	Totals. 1898.	Totals. 1897.
Stocks, January 1	278	20 =	298	404	433
Arrivals, January	1126	459 =	1585	1303	568
Aggregating	1404	479 =	1883	1707	1001
Deliveries, January	1090	443 =	1533	1389	648
Stocks, January 31	314	36 =	350	318	353

	PARÁ.			ENGLAND.		
	1899.	1898.	1897.	1899.	1898.	1897.
Stock, January 1	660	535	500	885	470	993
Arrivals, January	2985	3310	3360	690	1447	1522
Aggregating	3645	3845	3860	1575	1917	2515
Deliveries, January	2636	2705	2558	775	1225	1300
Stock, January 31	1009	1140	1302	800	692	1215

	1899.	1898.	1897.
World's supply, Jan. 31 (excluding Caucho)	3284	3506	4386
Pará receipts, July 1 to January 31	14,215	14,750	14,450

THE LATEST ANTWERP SALES.

TO THE EDITOR OF THE INDIA RUBBER WORLD: Since our last report the market remained unchanged, with little rubber

offering. To day's sales went off very satisfactorily. Prices show a rise of about 35 centimes on valuation. Bussira sold at 1.10 francs more per kilogram. The following prices were obtained:

Lots.	Kilograms.	Description.	Valuation.	Prices Paid.
No. 106	6536	Benguela	fr. 8 10	fr. 8 25
No. 107	613	Lower Congo	7 10	7.80
No. 100	5445	Mongalla	8.20	8.62½
No. 108	1993	Mongalla	8.30	8.67½
No. 110	1810	Mongalla red ball	8.90	9 35
No. 111	29,501	Mongalla mixed	8 80	9.02½@9.35
No. 112	2081	Mongalla ball	8 40	8.77½
No. 113	21,379	Upper Congo ball	8.85	9.15@9 20
No. 114	11,320	Aruwimi ball	8 30	8.62½
No. 115	290	Upper Congo	9 20	9 55
No. 116	1589	Red Kassai I	9.85	10 10
No. 117	2910	Red Kassai II	9 50	9.87½
No. 118	3749	Red Kassai III	8.75	8.75
No. 119	325	Black Kassai	9.35	9.60
No. 120	1032	Black Kassai	8.	8 45
No. 121	21,888	Bussira	9.10	10.20
No. 122	9670	Bussira grayish	9.	9.20
No. 123	2746	Upper Congo small ball	8 95	9.37½
No. 124	3139	Upper Congo medium	8.80	9 25
No. 125	986	Loanda II	8.	8.17½
No. 126	1040	Mangabeira	6.80	unsold
No. 127	970	Conakry ball	9.	unsold

The steamer *Albertville* arrived on the 10th inst., with the following quantities, which will be sold in March.

	Kilograms.
Upper Congo, Bangui	about 16,000
Upper Congo, Mongalla (mixed)	" 24,000
Upper Congo, Lake Leopold II	" 7,000
Upper Congo, Aruwimi	" 34,000
Upper Congo (Uellé)	" 5,000
Upper Congo, Equateur	" 33,000
Upper Congo, Lopori	" 14,000
Red Thimbles	" 8,500
Red Kassai	" 15 000
Wamba	" 3.000
Miscellaneous	" 50,000

SOCIÉTÉ COLONIALE ANVERSOISE.

Antwerp, February 17, 1899.

NEW YORK RUBBER PRICES FOR JANUARY.

	1899.		1898.	1897.
Upriver fine	96	@1.04	84@90	82 @83
Upriver coarse	86	@ 93	62@70	52 @54
Islands fine	93	@1.01	82@87½	78½@80
Island coarse	67	@ 72	53@60	44½@46
Cametá coarse	69	@ 75	57@61½	50½@51½

IMPORTS FROM PARA AT NEW YORK.

February 6.—By the steamer *Polycarp*, from Manáos and Pará:

Importers.	Fine.	Medium.	Coarse.	Caucho.	Total
Crude Rubber Co	168,700	26,400	88,600	1,300=	285,000
New York Commercial Co.	172,900	22,200	56,700	8,200=	260,000
Albert T. Morse & Co	15,100	6,700	88 300	24 500=	134,600
Reimers & Meyer	36,100	7,500	39,600	=	83,200
Boston Rubber Shoe Co	22,500	2,200	13 700	6,000=	44,000
Hagemeyer & Brunn	10,800	1,700	5,200	=	17,700
Otto G. Mayer & Co	12,400	900	4,000	=	17,300
Joseph Banigan	7,100	1,500	5,000	=	13,600
Kunhardt & Co	9,300	3,800	200	=	13,300
American Wringer Co	8,600	700	1,500	=	10,800
Edmund Reeks & Co	5,300	1,800	2 300	=	9,400
G. Amsinck & Co	2,200	2,500	1 400	=	6,100
K. Mandell & Co	3,600		900	=	4.500
Total	474,600	77,900	307,400	40,000=	899,900

February 17.—By the steamer *Hubert*, from Manáos and Pará:

New York Commercial Co.	337,800	54.400	158,700	1,900=	552,800
Crude Rubber Co	183,600	37,800	78,800	1,300=	301.500
Reimers & Meyer	154 600	27.100	157.400	=	339.100
Boston Rubber Shoe Co	105.300	17,200	26,800	=	159.300
Lawrence Johnson & Co	57,900	10 000	41,000	=	108,900
Edward Reeks & Co	40,600	11,400	16,000	=	68,000
Albert T. Morse & Co		1.100	52,000	=	53.100
Otto G. Mayer & Co	19,500	2,800	11,400	=	33,700
William Wright & Co	10,000	1,400	17,600	=	29,000
Joseph Banigan	17,100	4,000	8,700	=	29,800
American Wringer Co	13.900	2,200	10,700	=	26,800
George G. Cowl	4,200	700	800	=	5.700
Hagemeyer & Brunn	2,500		700	=	3.200
G. Amsinck & Co	7 400		800	=	8,200
Herbst Brothers	700	2,200	500	=	3,400
Total	955,100	172,300	591,900	2,900=	1,722,200

PARA RUBBER VIA EUROPE.

	Pounds.	
Jan 30.—By the *Britannic*=Liverpool:		
Albert T. Morse & Co. (Fine)	17,500	
Albert T. Morse & Co. (Medium)	4,500	
William Wright & Co. (Coarse)	3,000	25,000
Jan. 30.—By the *La Gascogne*=Havre:		
Reimers & Meyer (Fine)	42,000	
Reimers & Meyer (Medium)	3,500	
Reimers & Meyer (Coarse)	8,000	53,500
Feb. 2.—By the *Majestic*=Liverpool:		
William Wright & Co. (Coarse)		10,000
Feb. 6.—By the *Lucania*=Liverpool:		
George A. Alden & Co. (Fine)	45,000	
George A. Alden & Co. (Medium)	3,000	
Crude Rubber Co. (Fine)	43,000	
Crude Rubber Co. (Medium)	3 500	
Reimers & Meyer (Coarse)	12.000	
Otto G. Mayer & Co (Coarse)	9,500	116 000
Feb. 11.—By the *Germanic*=Liverpool:		
George A. Alden & Co. (Fine)	44,500	
George A. Alden & Co. (Medium)	13,000	
Crude Rubber Co (Fine)	45 000	
Crude Rubber Co. (Medium)	15,000	
Reimers & Meyer	11,500	129,000
Feb. 14.—By the *Etruria*=Liverpool:		
George A. Alden & Co. (Fine)	32,200	
Crude Rubber Co. (Fine)	35 000	
Otto G. Mayer & Co. (Coarse)	5,000	
Reimers & Meyer (Coarse)	15,000	87,200
Feb 15.—By the *La Bretagne*=Havre:		
A. T. Morse & Co. (Coarse)	22,000	
A T. Morse & Co. (Caucho)	50 000	
George A. Alden & Co. (Fine)	6,000	
Crude Rubber Co. (Fine)	5,000	
Otto G. Mayer & Co. (Fine)	11,000	
Otto G. Mayer & Co (Medium)	3,000	97,000
Feb. 20.—By the *La Touraine*=Havre:		
George A Alden & Co. (Fine)	18 000	
Crude Rubber Co. (Fine)	18 000	36,000
Feb. 20.—By the *Campania*=Liverpool:		
George A. Alden & Co. (Medium)	4,500	
Crude Rubber Co. (Medium)	4,000	8,500

OTHER ARRIVALS AT NEW YORK.

CENTRALS.

	Pounds.	
Jan. 27.—By the *Vigilancia*=Mexico:		
H. Marquardt & Co	1 500	
Fred Probst & Co	00	
Whitman & Barnes Mfg. Co	200	1,100
Jan. 31.—By the *Brasilia*=Hamburg:		
Reimers & Meyer		2,900
Jan. 31.—By the *Hudson*=New Orleans:		
A. T. Morse & Co	10,000	
Earle Brothers	7,000	
A. N. Rotho'z	4,000	21,000
Jan. 31.—By the *Alene*=Greytown:		
A. P. Strout	7,000	
Andreas & Co	4,500	
Guiterman, Rosenfeld & Co	2,500	
D. A. De Lima & Co	2,500	
Park, Son & Co	2,000	
Punderford & Co	1 700	
G. Amsinck & Co	1,700	
Kunhardt & Co	1,700	
Munoz & Espriella	1,000	
John Boyd, Jr., & Co	1 000	
Roldan & Van Sickle	1,000	
Flint, Eddy & Co	900	
A. D. Straus & Co	700	
Ellinger Brothers	500	
Mecke & Co	600	
For Europe	2,000	31,300
Feb. 1.—By the *Jamn*=Belize:		
Eggers & Heinlein	4,000	
A. S. Lascellas & Co	500	
Busk & Jevous	500	
W. R. Grace & Co	300	
Wallace, Muller & Co	100	
For London	1,500	6,900
Feb. 2.—By the *Finance*=Colon:		
Hirzel, Feltman & Co	21,292	
A. Santos & Co	10.722	
G. Amsinck & Co	10,300	
Flint, Eddy & Co	7,066	
Kunhardt & Co	5,588	
Dumarest & Co	4,546	
A. P. Strout	4,623	
Roldan & Van Sickle	3,700	
H. W. Peabody & Co	2,616	
D. A. De Lima & Co	2,515	
Frame, Alston & Co	1,750	
H. Marquardt & Co	1,718	
A. M. Capen Sons	1.909	
Lanman & Kemp	1,427	
M. Valvedo & Co	1,063	
Pomares & Cushman	151	80,986
Feb. 2.—By the *Majestic*=Liverpool:		
Livesey & Co	11.500	
George A. Alden & Co	1,000	12,500
Feb. 2.—By the *Bellucia*=Bahia:		
J. H. Rossback & Bros		1,200
Feb. 3.—By the *Irawaddy*=Trinidad:		
Kunhardt & Co		1,500
Feb. 4.—By the *Palatia*=Hamburg:		
Reimers & Meyer		5,900
Feb 4.—By the *Yucatan*=Mexico:		
H. Marquardt & Co	1.000	
J. W. Wilson & Co	500	
L. N. Chem-dlin & Ce	300	1,800
Feb. 6.—By the *St. Louis*=Soutnampton:		
Reimers & Meyer		3,000
Feb. 6.—By the *Homer*=Santos:		
Thomson & Co		2,000
Feb. 6.—By the *Algiers*=New Orleans:		
A. T. Morse & Co	1,500	
Earle Brothers	1,000	2,500
Feb. 6.—By the *Louisiana*=New Orleans:		
A. T. Morse & Co		11,000
Feb. 6.—By the *Lucania*=Liverpool:		
Reimers & Meyer		2,000
Feb. 7.—By the *Alleghany*=Cartagena:		
Kunhardt & Co	6,000	
J. H. Lang	2,500	
Flint, Eddy & Co	3,000	
J. Ferro	2,000	
Munoz & Espriella	500	
For Bremen	1,000	15,000
Feb. 10.—By the *Kensington*=Antwerp:		
Reimers & Meyer		9,000

L. C. CHASE & CO.,

LONDON, ENG., BOSTON, NEW YORK, CHICAGO, CINCINNATI, ST. LOUIS, SAN FRANCISCO.

MANUFACTURERS OF

Rubber Carriage Ducks and Drills.

ALSO

CHASE { TOUGH TREAD TIRES, FOXHOUND " RACER " } CHASE { SPECIAL TIRES, VULCAN " PILOT " }

Both Smooth and Corrugated.

Mention The India Rubber World when you write.

RIDE CHASE TIRES.

Phototype of a "BOSTON" RAWHIDE MALLET.

The rawhide used is imported and cured expressly for this mallet, is hard, tough, and far superior to the white sponge hide generally used to fill mallets. Has leather handle and is perfectly balanced. Every trial order has made a permanent customer. 2,000 sold in 1897.

Weight, 2 to 14 pounds. *Send for Catalogue.*

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SUBLIMED WHITE LEAD PICHER PICHER LEAD CO. JOPLIN, MO. U.S.A.

PICHER SUBLIMED WHITE LEAD.

THE IDEAL WHITE LEAD PIGMENT FOR RUBBER MANUFACTURERS.

Softer, finer and more satisfactory for compounding than any other white lead. The only white lead for rubber makers. - - - - - - - - - - - - - - -

SOLD ONLY BY

CHADWICK LEAD WORKS, BOSTON, MASS.

THE PICHER LEAD CO., Western Union Building, Chicago, Ill.

Mention The India Rubber World when you write.

FEB. 11.—By the *Orizaba*=Mexico:

E. Steiger & Co	4,000	

FEB. 14.—By the *Allianca*=Colon:

Isaac Brandon & Bros	11,556	
Crude Rubber Co	3,785	
Munoz & Espriella	3,700	
J. Aparicio & Co	3 450	
Flint, Eddy & Co	2,493	
Pomares & Cushman	2,210	
G. Amsinck & Co	1,800	
Hirzel Feitman & Co	1,700	
W. R. Grace & Co	1,121	
Samper & Jimenez	385	32,200

FEB. 14.—By the *Etruria*=Liverpool:

Reimers & Meyer		3,500

FEB. 14.—By the *Paris*=Southampton:

Reimers & Meyer		8,000

FEB. 14.—By the *Bufon*=Bahia:

New York Commercial Co	3,300	
L. Johnson & Co	6,500	9,800

FEB. 15.—By the *Alta*=Cartagena:

A. P. Strout	5,000	
D. A. De Lima & Co	6,000	
J. H. Lang	6,000	
Flint, Eddy & Co	4,000	
Park, Son & Co	2 500	
Guiterman Rosenfeld & Co	1,500	
Abuchar Brothers	1,000	
R. Fabein & Co	500	
Kunhardt & Co	500	
Munoz & Espriella	500	27,500

FEB. 15.—By the *Karthago*=Mexico:

H. Marquardt & Co	3,500	
Flint, Eddy & Co	1,000	
L. N. Chemedlin & Co	1,000	
H. W. Peabody & Co	300	5,800

FEB. 15.—By the *Livorno*=Santos:

Reimers & Meyer		2,000

FEB. 17.—By the *Teutonic*=Liverpool:

George A. Alden & Co	6,400	
Crude Rubber Co	6,200	12,600

FEB. 20.—By the *British King*=Antwerp:

George A. Alden & Co		2,500

FEB. 20.—By the *St. Paul*=Southampton:

Reimers & Meyer		2,000

AFRICANS.

	POUNDS.	
JAN. 30.—By the *Britannic*=Liverpool:		
Livesey & Co	13,100	
George A. Alden & Co	7,200	
Joseph Cantor	4,200	
William Wright & Co	3,600	28,100
JAN. 30.—By the *Aurania*=Liverpool:		
George A. Alden & Co	13,500	
Livesey & Co	18,200	
Reimers & Meyer	9 500	
William Wright & Co	13,300	52,500
JAN. 31.—By the *Brasilia*=Hamburg:		
A. T. Morse & Co	6,000	
L. Windmuller & Roelker	6,000	12,000
FEB. 1.—By the *Westernland*=Antwerp:		
Otto G. Mayer & Co	13,000	
FEB. 2.—By the *Majestic*=Liverpool:		
George A. Alden & Co	9,000	
William Wright & Co	6,000	16,000

FEB. 6.—By the *Peninsular*=Lisbon:

Albert T. Morse & Co	50,000	
Reimers & Meyer	45,000	
George A. Alden & Co	18,000	
Crude Rubber Co	15,000	128 000
FEB. 6.—By the *Lucania*=Liverpool:		
George A. Alden & Co	13,000	
Crude Rubber Co	12,000	
Reimers & Meyer	30,500	
William Wright & Co	93,000	
Otto G. Mayer & Co	7,000	155,500
FEB. 10.—By the *Kensington*=Antwerp:		
George A. Alden & Co	38,500	
Crude Rubber Co	38,500	
Albert T. Morse & Co	38,000	
Reimers & Meyer	33,000	
Boston Rubber Shoe Co	11,500	
Otto G. Mayer & Co	60,000	219 500
FEB. 11.—By the *Germanic*=Liverpool:		
George A. Alden & Co	18,500	
Crude Rubber Co	18,000	
Livesey & Co	5,000	
Reimers & Meyer	2,500	44,500
FEB. 14.—By the *Etruria*=Liverpool:		
George A. Alden & Co	44,000	
Crude Rubber Co	45,000	
Otto G. Mayer & Co	3,000	
Reimers & Meyer	5,000	
Livesey & Co	24,500	121,500
FEB. 14.—By the *Paris*=Southampton:		
Reimers & Meyer		10,000
FEB. 17.—By the *Teutonic*=Liverpool:		
Otto G. Mayer & Co. (Almedina)		3 500
FEB. 17.—By the *Teutonic*=Liverpool:		
O. G. Mayer & Co	15,000	
Albert T. Morse & Co	15,000	
Livesey & Co	2,500	
Order Fincham, Bretton & Co	11,500	44,000
FEB. 8.—By the *Maasdam*=Rotterdam:		
Reimers & Meyer		15,000
FEB 20.—By the *Campania*=Liverpool:		
Reimers & Meyer	65,000	
William Wright & Co	40,000	
George A. Alden & Co	15,000	
Crude Rubber Co	20,000	
Otto G. Mayer & Co	11,000	151,000
FEB 20.—By the *Noordland*=Antwerp:		
Reimers & Meyer	17 000	
Windmuller & Roelker	11,500	
Otto G. Mayer & Co	13,500	42,000

EAST INDIAN.

	POUNDS.	
JAN. 31.—By the *John Sanderson*=Singapore:		
George A. Alden & Co. (Pontianak)	161,000	
Reimers & Meyer (Pontianak)	335,000	
Reimers & Meyer (Borneo)	11,000	
J. W. Greene & Co. (Borneo)	34,000	
J. W. Greene & Co. (Pontianak)	22,000	563,000
FEB. 20.—By the *St. Paul*=Southampton:		
Reimers & Meyer		8,000

GUTTA-PERCHA AND BALATA.

	POUNDS.	
JAN. 31.—By the *John Sanderson*=Singapore:		
Gilfillan, Wood & Co		3,300
FEB. 6.—By the *St. Louis*=Southampton:		
H. H. Smythe		2,500

BALATA.

FEB 3.—By the *Irrawaddy*=Trinidad:		
Cadenas & Coe		1,600

CUSTOM-HOUSE FIGURES.

PORT OF NEW YORK—JANUARY.

Imports:	POUNDS.	VALUE.
India-rubber	5,658,864	$3,595,917
Gutta-percha	25,442	9,510
Gutta-jelatong (Pontianak)	938,401	20,082
Total	6,622,707	$3,625,509
Exports:		
India-rubber	74,135	$41,124
Reclaimed rubber	109,853	11,086

BOSTON ARRIVALS.

	POUNDS.
JAN. 3.—By the *Bay State*=Liverpool:	
Reimers & Meyer—Coarse Pará	12,000
Reimers & Meyer—African	9,916
JAN. 5.—By the *New England*=Liverpool:	
——— African	11,756
JAN. 9.—By the *Sachem*=Liverpool:	
Reimers & Meyer—Coarse Pará	47,209
Reimers & Meyer—African	12,000
Livesey & Co.—African	26,708
JAN. 12.—By the *Oakmore*=London:	
George A. Alden & Co.—Centrals	1,156
JAN. 16.—By the *Sagamore*=Liverpool:	
George A. Alden & Co.—African	25,933
Reimers & Meyer—African	19,108
JAN. 16.—By the *Armenian*=Liverpool:	
Reimers & Meyer—African	11,296
JAN. 19.—By the *Cambroman*=Liverpool:	
Reimers & Meyer—Coarse Pará	17,175
Reimers & Meyer—African	20,000
JAN. 23.—By the *Cambrian*=London:	
George A. Alden & Co.—Centrals	1,434
Reimers & Meyer—East Indian	1 509
JAN 25.—By the *Michigan*=Liverpool:	
Reimers & Meyer—African	2,671
JAN. 27.—By the *Uttonia*=Liverpool:	
Livesey & Co.—African	8,776
JAN. 31.—By the *Sylvania*=Liverpool:	
Livesey & Co.—Centrals	8 748
Total	247,345
Total value, for January	$147,488

NEW ORLEANS.

JANUARY.

	POUNDS.	VALUE.
From Nicaragria	87,239	$61,164

JANUARY EXPORTS OF INDIA-RUBBER FROM PARA.

[NOTE.—The figures denote weights in Kilograms.]

EXPORTERS.	UNITED STATES.					EUROPE.					TOTAL.
	FINE.	MEDIUM.	COARSE.	CAUCHO.	TOTAL.	FINE.	MEDIUM.	COARSE.	CAUCHO.	TOTAL.	
Adelbert H. Alden	251,940	39,426	95,180	21,200	407,755	36,890	2,890	22,200	—	61,980	469,735
The Sears Pará Rubber Co.	239,776	41,857	119,637	29,112	430,382	—	—	—	—	—	430,382
Pusinelli, Prüsse & Co.	97,750	11,560	89,620	—	198,930	69,530	6,120	21,020	—	96,670	295,600
La Rocque da Costa & Co.	47.805	9,856	82,885	30,050	170.596	39,509	12,586	37,940	1,832	91,867	262,463
Denis Crouan & Co	41,820	7,650	15.920	—	65,390	21,080	2,720	10,280	—	34,080	99,470
Rudolf Zietz	16,181	911	8,719	—	25,811	37.646	5,384	18,379	—	61,409	87,220
R. Suarez	—	—	—	—	—	38,118	3.278	13.465	—	54,861	54.861
Velhote, Silva & Co.	—	—	—	—	—	9,520	510	8,600	—	18,630	18,630
Pires, Teixeira & Co	8,290	1,240	3 820	—	13.350	—	—	—	—	—	13.350
Singlehurst, Brocklehurst & Co.	—	—	—	—	—	7,905	1,969	8,368	—	11,242	11,242
Kanthack & Co.	—	—	—	—	—	4.347	285	3,040	—	7,672	7.672
A. Berneaud	4,080	340	800	—	5,220	—	—	—	—	—	5,220
H. A. Astlett	2,550	850	1,120	—	4.520	—	—	—	—	—	4.520
Sundry Shippers	—	—	—	—	—	39,100	6,800	5.791	3,964	55,655	55.655
Direct from Manáos	248,872	51,808	75,381	24,989	401,050	309,589	70.716	72,464	29.728	482,497	883.547
Total for January	959,064	165.498	493.091	105.351	1,723,004	613,234	113,258	214,547	35.524	976,563	2,699,567

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625,509

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OUNDS.

12,000
9,916

11,756

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26,706

1,156

25,933
19,108

11,296

17,175
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1,434
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2,671

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47,345
47,488

ALUE.

31,164

TAL.

,735
,382
,600
,463
,470
,220
,861
,630
,350
,242
,672
,220
,520
,655
,547

,567